KNOWLEDGE DIMENSIONS ESSENTIAL FOR REDUCTION OF CROSS CULTURAL UNCERTAINTY IN GLOBAL PROJECT MANAGEMENT

THESIS
SYNOPSIS

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By

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SYNOPSIS

The purpose of this research was to develop a conceptual framework for analyzing the effects of involvement of global workforce (cross cultural teams and team members) in international project management (PM) and to unearth a few knowledge dimensions essential for successful global project management, where markets are taking advantage of the strength and economies of a diverse global workforce.

The four objectives which were there in author’s mind are,

1. Establish that the successful project management is managing “incomplete Knowledge”,
2. Correlate knowledge creation and amalgamation as a project risk mitigation requirement,
3. Development of knowledge flow model across multi disciplinary project environment with a focus to reduce / preempt uncertainty and
4. Explore the potential to extend the model cutting across inter organizational boundaries.

When the author embarked on the research work he found that there is no need to reestablish the first objective. The author’s experience and interaction with his pears clearly suggested that project management profession well appreciates and understands that incomplete knowledge need to be addressed to reduced project uncertainties. The author also found good support from published literature as well which conveyed the same in some form or the other.

Having taken this as something already well accepted/established in the project management filed, the author started concentrating on the second objective, which was to unearth and amalgamate greater knowledge in uncertain areas of project management, so that incompleteness of knowledge is reduced to some extent thereby increasing the possibility of project success. The author further felt the need for this research dealing with global project management in a cross cultural context to be more focused in exploring the factors whose lack of comprehension by project management/leadership would make culture itself a huge risk factor in project performance. This is the key slice of uncertainty, the author chose for the research work to concentrate. Any meaningful knowledge model as envisaged (third objective) could be brought out only after the key dimension impacting cross cultural projects are well researched and established.

According to the PMBOK, project management is to assure that a specified project scope is completed on time, within budget, and to quality specified. Project team has implied responsibility, according to the PMBOK, to operate with diverse workforce to succeed in meeting these goals through effective management. Currently the Project Management literature does not provide adequate guidance on what skills are necessary for the project management to accomplish this.

International projects having multi-cultural teams located in multiple countries may be handled by Project Managers and team members who come from different countries. Each of these teams in turn could again comprise of members from many different culture/societal backgrounds. The dimensions of “cross cultural domain” as applicable to project management are not well captured as essential knowledge base. Project organizations have still not fully woken up to the severity of the impact that such incomplete knowledge in these areas can have in the sphere of project.
management in global context with a diverse and multi-cultural work force. This greatly increases the uncertainties associated with such projects. The author’s experience in such markets, and the glaring need for a Cross-Cultural Knowledge Management model that could be used to improve project management skills in international markets were the reasons for undertaking this research. There is no ready mix to solve every project problem. However, the more prepared/armed the project leadership/team is with the virtues of the key knowledge dimensions influencing the Cross-Cultural projects scenario the better suited is the project management style to forestall and to eliminate uncertainties. Once uncertainties are eliminated or at least reduced the probability of project failure is also proportionately reduced. This is the basic premises on which the research work proceeds.

Research preparation effort in turn builds to the overall Research Thesis and facilitates the discipline that is necessary for performing doctoral level research, but at the same time takes due note of the years of practical experience available. History teaches that we must learn from our past, so the research takes advantage of author’s own experience and augmented by the reflection of insights gathered during his varied industry experience in this field and his interactions with many peers in the field over the years. The author has worked in numerous projects across the globe. Among them specifically one project in Thailand (called Project A hereafter), one in South Korea (called project B hereafter), one in China (called Project C hereafter) and one in India (called Project D hereafter) have been considered during the course of this research work. The project involved global organizations and stakeholders from USA, Japan, South Korea, Thailand, China, Europe etc. While working in these projects, the author always came across many situations where he found that solution/ effective handling of problems under project A is different from project B which is totally different in project C and D etc. due to cross-cultural diversities of these projects, their team constitutions and project management perspective of a particular problem etc. etc.

The structure of the research program that author followed started with taking the real project situations selected strategically. The core research adopted Grounded theory methodology using data collected directly from project books and the author’s own experience about the situations followed by the interactions with other project management exponents. Then the work was followed by reflective learning that provided time and space for reflection upon the core work, and upon personal experience. The descriptive research was then subjected to an extant literature review for the concepts area that emerged, and used to construct the descriptors and sub-descriptors for each of the dimensions which would constitute the requisite knowledge base for these situations.

Author used Grounded theory (GT) as the overarching methodology to study data from exploratory case studies and to drive data acquisition activities within and outside the case study. As the author had professional experience in the substantive area of his study, Grounded theory was an appropriate approach because it provided a method to deal with his experience, controlling the risk of introducing bias into the study. As such seeking to generate theory grounded in case study data was a particularly appropriate strategy for this research.

Data is collected, by review of project books and noting down observations in real life experience. The author had taken descriptive notes on the content of the project book and
observations made during many situations at different stages of project execution. The data was further validated by taking inputs from few important participants who were involved and played significant role in the situation. The author also decided to take a few notes during the telephonic interviews / discussions with the key participants of the project cases and do post-interview notes as required. This extra effort was justified as a risk mitigation strategy. By taking notes, author could then use these notes to record memos or to guide his next interview while the data of previous interview was being analyzed. Listening to the participants often triggered theoretical memos and facilitated the finding of relations. Data from field notes are conceptualized line by line. In the beginning of a study everything was coded in order to find out about the situations and how the problem could have been resolved. The author went back and forth while comparing data, constantly modifying, and sharpening the growing theory at the same time.

After conceptualizing incidents, memos were used to both refine and keep track of ideas that develop when author compared the incidents to incidents and then concepts to concepts in the evolving theory. Memoing was taken as total creative freedom, the writing used as an instrument for outflow of ideas, and nothing more. It is important to note that the model is not forced beforehand but has emerged during the comparative process of GT. So the theoretical codes just as substantives codes emerged from the process of constantly comparing the data in field notes and memos.

In the next step memos are sorted, which is the key to formulate the theory for presentation to others. Sorting puts fractured data back together. Sorting memos generates theory that explains the main action in situations studied. Memos raised the theoretical level via a continuous process of comparison and conceptualization. During research process, the role of the extant literature was very important to acquire sensitivity and knowledge on grounded concepts. The literature is therefore read as a source of more data to be compared with existing grounded data.

Author experienced a high level of participant cooperation while conducting his grounded theory study. This can be partly attributed to the open nature of the interviews, the focus on experiences as perceived by the participants, the method forcing him to act as a very active listener, and the author being perceived as an ‘insider’ to whom they did not require too much ‘proper lining’. During the research, some key participants were contacted to interview and get feedback with assured confidentiality in the reporting of data; notes were taken for inputs of participants regarding the situation and overall scenario in entire project management cycle. Connection of this data back to the individual participant is almost impossible to trace. Identification of the individual participant was not of paramount importance, because the concepts generated by the participants-not the individual participants-were at the center of study.

When selecting a case for a case study, author used information-oriented sampling, as opposed to random sampling. Typical or average case is often not the richest in information. Extreme or atypical cases reveal more information because they activate more basic mechanisms and more actors in the situation studied. Random samples emphasizing representativeness will seldom be able to produce this kind of insight; it is more appropriate to select few cases chosen for their validity. By selecting cases, which has got strategic importance in this research author arrived at cases that allow generalization of concepts. Cases selected here are referred to as critical
incidents that had faced inadequacies during project cycle. Four global projects were considered for the study of cross cultural issues in international project management.

Author identified four projects having a negative impact on project management as a whole, clearly portraying a clash of cultural values and representing areas in which conflicts had occurred in project teams. This induces the author’s thinking in line with his objectives as the team members needed to complete project tasks efficiently and make value judgments on courses of action, based on information not applicable in their own cultural environments. The author’s reflection in this context is summarized below to provide the flow of reasoning which led him to choose a few situations out of each of these projects to conduct the case study / analysis utilizing Grounded theory.

**Project A** is a 2100 MW power project having project cost of $ 1600 Million being developed in Thailand and the project participants included organizations from Thailand, Japan and USA based power Project Company. Author himself played an important role in this project as a member of senior management team for the USA based company. All three organizations have management teams comprising of persons from different countries / cultural backgrounds contributing to this project. Throughout the course of the execution of this project it was found that the Contractor Company and the customer did not exhibit any cohesive Temporary Project Organization (TPO) culture, and certainly did not display a sense of teamwork. Having failed to consider the flow of information and knowledge across the cultural barriers, the project participants were left to grapple with the inadequacies of the TPO. The inadequacies faced in this project were sufficient enough to justify selection of this project to explore the data for Grounded theory research using case study

**Project B** is a 2400 MW power project having project cost of $ 2100 Million being developed in South Korea and the project participants included organizations from South Korea, Italy and USA. The author’s was a member of top management team for the USA based company in this project. During the course of execution of the project it was found that the contractor company and the customer did not exhibit the semblance of any unified TPO structure conducive to creation of appropriate project cultures. The customer treated the Contractor Company members as mere deliverers of errands or services. As such the project had to face the inadequacies of TPO culture. The problems faced in this project prompted the author to include this project for this research.

**Project C** is a power project developed in China by a USA based company. This is 700 MW power project having project cost of $ 510 Million being developed in China and the major project participants included organizations from China and USA. The author himself played an important role in this project as a member of Top management team for the USA based company. This power project was taken very aggressively by Chinese company to meet their organizational objectives and had active involvement of Chinese government. In this project, the customer determined the structure of the TPO and wanted to act as the project lead, but they were unwilling to take responsibility of the resolution of inadequacies. So the TPO did not function as a well oiled machine. Lack of team work, a sense of mistrust, and air of assumed authority without matching responsibility confronted the project. The situation got more complicated as the project was very aggressively scheduled with an unrelenting government bent
on further and further squeezing the milestone dates. The shortcomings of TPO culture came to
surface during the execution of the project. This induced the author to select situations in this
project for this research.

**Project D** is a 600 MW thermal power project having project cost of $600 Million being
developed in India by a power utility Company and the project participants included
organizations from India and Chinese Project Company. This project faced “heavy weather”
during execution and it was only the huge reputations that each organization (giants in their own
rights) wanted to protect that saw the project through at a considerable expense of resources
rather than any great team work of the participating project organizations. However, the structure
of the TPO which did not facilitate creation of a unified project culture and the disparate goals
were too great for the project management to overcome the inadequate situations encountered
during project execution.

All these four international projects faced number of inadequacies on account of cultural
uncertainties, as can be seen from the above description. The situations selected out of these
projects for this research are rife with issues arising out of organizational as well as individual
differences in perception mostly owing to diverse cultural back drop. Post project analysis of the
situations also pointed to the key concepts that were lacking amidst the various project stake
holders and team members which usually led to unstable platform of interaction where no real
solution was immediately forth coming. Some of the situations selected clearly brought out that
once, these key dimensions were appreciated and embraced by the project management frame
work in whatever degree possible, there had been distinct improvement in reducing the impact of
such cultural uncertainty leading to better performance of the project. Some other situations on
retrospective analysis indicated that if these concepts were utilized appropriately by the project
management team better results could have been obtained. In this context, the above four
projects would provide ample cases which could be studied and analyzed utilizing Grounded
theory to generate key concepts.

**First** situation selected is from project A which deals with an inadequacy due to the failure of
mechanisms in power plant components which did not fulfill the requirements of the real plant
and components and the erection work got halted midway. This was a typical example of
culturally diverse organizations and project members of either side getting in to the cocoon of
their contracted rights without really meeting across the table to see if anything can be done to at
least partially salvage the situation. Certain inadequacies were partially identified but because of
its unusual nature and diverse organizational cultures of the organizations, they failed to
coordinate and handle this issue in earlier stage leading to stale mate for considerable period and
avoidable time delay. The key observations noted are lack of coordination to bring two
companies together, PM firm unfortunately did not exude enough confidence to the Customer
Company after they came into contact; Customer Company retained power to make all major
decisions and to approve even minor changes. Midway through the stale mate PM made a
conscious effort to understand the reason for stands taken by the different participants and
members of all the teams. Project manager’s approach to understand the issues in diversified
cultural back drop helped him to handle the issue successfully in due course. Actual impact was
substantial in terms of time and cost both. Project could not have been transformed in to a
successful project, if all issues would not have been addressed by PM with cultural awareness.
Late than never as otherwise the effect would have been loss of time and money many times of
the above.

**Second** situation selected is from project A which deals with a dispute that arose while finalizing
design basis and drawing due to varied interpretations and assumptions between the teams
basically because of engineering practices steeped in differing cultural backgrounds. Each team
was not willing to look in to the merits of other side’s arguments and took rigid postures,
resulting in unproductive meetings and the project started suffering due to lack of approved
drawings. The two teams instead of getting to the essence and spirit of what is needed for the
robust design of the plant got side lined with frivolous and nonexistent issues. The key
observations by author are that the two teams got hung up on procedural and code related
arguments arising out of different project management engineering practices, the situation was
a result of core ego issues between two teams rather than real hard core issues, postures of the
teams reflected attributes related to their cultural and organizational backgrounds. Situation
started improving only after PM of Contracting Company started looking at core issues leading
to such a stand off from the customer point of view. Many difficulties arose, and trust increased
very slowly, experiencing continuous resistance, possibly owing to lack of cultural sensitivity on
either side. Transformation of this project was possible only after proper handling of the situation
giving due importance to communication, coordination and trust.

**Third** situation selected is from project B. During erection and commissioning work for TG, the
site engineering teams faced a problem related to TG deck elevation. This caused tremendous
unrest in site teams since all interconnecting piping and cutting of components was already done
as per design. At first sight, the problem came out to be technical in nature but the consequences
of this gave author enough inputs related to cultural issues. Initially exchange of letters between
the companies resulted in blaming each other for the issue. Response from either side was
basically posturing for self protection arising out of the respective organizational cultures of
viewing contract terms and taking ownership of failures that resulted in war-fare of shifting the
blame on either side. The key observations of the author are that the customer managers were
afraid of taking it to their management because of expected inductive action (Oriental Culture),
the issues related to power and lack of trust because of Customer Company’s perceptions
about the situation and role of the other party, language barrier preventing open and effective
verbal and written communications. With better handling and more grasp of cross cultural
dynamics possibly the issues could have been addressed avoiding much delay.

**Fourth** situation selected is from project B which is about handling of the issues emerging after
damage of the Actuator during transportation from China to Korea. Situation comprises of a
problem which needed technical solution, but handling of the situation prompted the author to
take it as case study which reflected cultural bias through actions of the individuals involved and
organizations as a whole. Only providing solution for any technical problem is not enough to
come out of a stale mate resulting out of such situations. There are certain behavioral and
organizational issues that exist in any project execution which has got cultural bias of the
individually or organizations involved in the situation. This case has presented a brief review of
research on culture and the differences between nationalities working for same international
project. The key observations are stands of each participant and teams which reflected mainly the
geographical cultural issues of the participants. More or less each individual had some
predetermined values and learning which is biased by their cultural backgrounds. The important thing was for PM of contracting company to come out of his technically superior posture and talk to customer on even terms.

**Fifth** situation selected is from project C. Contractor Company was not able to take decision on size and dimensions of the foundation for stator lifting stand. The decision, for selection of supplier and subsequent supply would take time in a tight schedule which did not permit the time to construct the appropriate foundation. Situation dealt with decision given by project management, which had to face resistance from the participants before acceptance. The resistance was result of the individual’s cultural background taking precedence over organizational goals. The key observations are failure of communication; progress got affected due to clashes between two managers, lack of coordination and trust amongst the participants because of their own preset notions, resistance resulting out of improper communication without accounting for cultural nuances of personalities involved. PM’s decision was based on impact to project delivery schedule, however it was construed as an instruction to show-off his authority by the senior members of the team affecting the team relationship. Better knowledge of project head about the cultural background could have been useful to minimize the friction or to avoid the situation.

**Sixth** situation selected is from project C. During installation of boiler contractor’s inspection engineer found that parts sent by supplier had minor deviations with respect to drawings. The cultural/organizational background of each of the team was different causing conflicts regarding acceptance of the parts. Reluctance was basically because of their predetermined mindset which did not allow them to accept anything not meeting the specified parameters. This led to a situation responsible for delay of the project. The key observations are response from the inspection team for such changes did not reflect the technology reasons for their reluctance but the behavioral aspects of the team supported by their cultural background, PM needed to be aligned with the local communities, and the project manager had to understand the local national culture which accorded only secondary importance to documentation. The project manager having experience of working with teams with various cultural backgrounds understood the reaction by all team members of all project participant companies. PM could only address the issues on an individual level rather than on organizational level resulting in partial salvage of the damage but delay in commissioning affected the project schedule and float was totally nullified for all related activities. If not addressed on time, this could have resulted in complete project failure possibly no commissioning in near foreseeable future.

**Seventh** situation selected is from project D. Number of issues started surfacing as the project moved through the planning and execution phases. Manufacturer’s inadequate quality systems led to significant cost overruns, as well as frequent misunderstandings between the engineering teams in the US, China and India. Being more focused on ultimate objectives of schedule and cost of the project, Customer Company took a stand, not to go ahead in such uncertain situation. The company’s senior management decided to stop the project and terminate the contract with the Chinese company, who subsequently brought a legal case in a China court. The key observations are misunderstanding, half-hearted coordination and failure of communication amongst the participants leading the project to such a critical stage, lack of confidence amongst the member of same organization itself, organizational goals being ignored for satisfaction of the
ego of individuals, dispute between the parties transcended into organizational warfare due to cultural insensitivity. Relational disaster culminated in termination of contract hampering project progress significantly. Legal proceedings indicate national cultural hurt.

**Eighth** situation selected is from project D. The Indian company was more interested in reduction of time and cost without compromising any change in designed specifications as per international codes. The Chinese manager had shown his inability to achieve such objectives without change in any specifications for few components. The design manager (western) did not accept any changes suggested by Chinese manager, which was clear cut indication of conflict in the same organization between two culturally divergent management styles. Quality documentation plays second fiddle in Chinese cultural setup which is not well understood by western managers. The key observations are lack of concern for documentation of changes leading to misleading communications, decisions coloured by individual’s perception, interpretations of the change biased by their cultural background. In this situation, PM was not empathetic to diverse environment having participants from different cultures.

The impact of problems because of certain key reasons are grouped together at analysis phase to relate between different sub-categories and how they can be related to each other and part of a same category. The major concepts that emerged from GT case study approach are importance for communication & coordination, conflict management, importance of language for verbal and written communication, information flow—fast/low, professional project management, successful project completion, mutual trust and respect for each other, confidence in parties involved, mutual respect for each other, depth of understanding, retention of power, long term orientation, individualism, collectivism, masculinity, decision making, organizational issues, cultural issues.

Depending on these concepts the categories are listed using number of references evident during memoing and sorting. These are organizational diversity (11 nos.), organizational culture (9 nos.), communication (12 nos.), transformation (6 nos.), trust (8 nos.), empathy (6 nos.) and power (14 nos). When the author analyzed the cases referred for research analysis with specific interest for subject under study, cultural outlook, and cultural diversity being central to the situations were reflected in all above categories. So the emerged concepts are confined to the five categories that are trust, empathy, transformation, power, and communication.

The next step was to compare the emerged theory with the extant literature and examine what is similar, what is different, and why. Overall, tying the emergent theory to existing literature enhances the internal validity, generalisability, and theoretical level of the theory building from case study research, because the findings rest on a very limited number of cases. The role of the extant literature was very important because researchers need to acquire sensitivity and knowledge on grounded concepts. The literature is therefore read as a source of more data to be compared with existing grounded data, actors’ main concerns and the emerging theory.

The many contributions to the management as a whole and being more specific when related to research subject and categories emerging from grounded research provided an important link between leadership styles and importance of aspects of culture viz. cultural knowledge and theory for cultural issues and conflict management. So using these knowledge bases for
descriptive research as extant literature for digging into literature was evident for the author. Thus, the knowledge base studies refined and confined to the four factors which can be related to the categories already emerged and serve the purpose of illustration of the categories and provide more description of the categories as descriptors for further validation and fill the gap as desired. The four factors are Cultural Theory, Cultural Knowledge, Leadership Theory and Conflict Management. These four key influencing factors are studied in depth from various sources to illustrate the basic concepts emerging out of GT for research which may be helpful in final sorting stage as more data. Globe survey is also used to link the outcome of Grounded research and theory to the attributes given by Globe survey. The GLOBE survey has been utilized as a benchmark to correlate the findings of this research to a recent broad study of cross-cultural leadership.

The thesis further establishes the existence and universality of the knowledge dimensions through the hypothesis formulation and the testing of the hypothesis was performed using a Delphi panel of experts in project management, through two sessions of questions with feedback after the end of the first session. Subsequently, the results are analyzed, studied, and evaluated with an eye toward the author’s practical experience in the field – sense making. Based on the validation of the hypothesis the research work brings out the Cross Cultural Global Project Management Intelligence (XCGPMI) model incorporating the same to act as a ready reckoner for international project practitioners.

This thesis proposes five hypotheses for the Cross Cultural Global Project Management Knowledge dimensions of Trust, Empathy, Transformation, Power and Communication and its descriptors, and sub-descriptors. First hypothesis is Cross Cultural Global Project Management requires the creation and maintenance of Trust, regardless of culture. Second hypothesis is Cross Cultural Global Project Management requires the creation and maintenance of Empathy, regardless of culture. Third hypothesis is Transformation leadership is a characteristic of an effective project team regardless of culture. Fourth hypothesis is Power is a characteristic of Project team’s functioning especially the leadership level, regardless of culture. Fifth hypothesis is effective Communication is a characteristic of effective project management, regardless of culture.

After comparing the extant literature and thorough information available on the concepts of interest, author could get the descriptors of each category which are either derived from extant literature referred and discussed in thesis or from project cases discussed earlier along with logical validation of author for the subject of specific interest during the research process.

Each hypothesis was introduced to the panel members with the statement that there exists knowledge bases of key dimensions of Cross Cultural Project Management that are universal regardless of culture. Project Management must apply these dimensions in different degrees depending upon the culture(s) involved. The panel members were also asked to evaluate each of the Cross Cultural Project Management Knowledge dimensions against each of the GLOBE dimensions with a similar question. The correlation, or mapping, was then performed by asking the Delphi panel members to rate the strength of the connection between each of the five knowledge dimensions, and each of the GLOBE cultural dimensions (uncertainty avoidance, power distance, group collectivism, gender egalitarianism, assertiveness, future orientation,
humane orientation and performance orientation). After review of the methodology and literature on other testing methods available, author decided to explore the use of the Delphi technique for testing the hypotheses that emerged from grounded research methodology.

The hypothesis is itself emerging out of Grounded theory and the survey utilizing Delphi panel technique is a further validation of the same. In this context the selection of panelists is done keeping in mind about the Indian managers who are working / worked in global projects and had faced cross cultural issues in their work/ projects. This sort of ensures that the research findings and the resultant model will be reconfirmed as valid by Global Project management fraternity of Indian origin and will stand them in good stead. Needless to say the applicability of the research findings will be appropriate to all international project management situations as the theory and hypothesis have emerged in the first place out of utilizing Grounded theory to international project situations with cross culturally diverse participants across the Globe.

In first round questions, there was an initial list of questions that was developed from the research. The first round provided the panelists with 135 total questions. The questions explored the cross cultural project management dimensions first, and then queried the connections between these dimensions and the GLOBE cultural dimensions. The panel was asked to connect the hypothesis dimensions of trust, empathy, transformation, power, and communication, to the GLOBE survey dimensions of culture. The analysis of first round gave the scores of the panel members were analyzed to find the statistical median of each question, the mean, and the standard deviation. The results of the first round indicated a reasonably tight grouping of opinion on most of the questions, with a few outliers.

In second round questions, the median, average, and standard deviation for each question were provided to each panel member. On the eight questions selected as above scatter charts, scores vs. no. of respondents, and analysis (graphical) of means based on culture, experience level and fields of project exposure were also provided to enable the panel members to visualize the responses. In addition, each panel member was provided with their answers to the first round of questions. The panel members were then asked to reassess their first session answers, and to adjust them as they saw fit. As with the first round, the scores were analyzed to find the median, average, and standard deviation of the responses. The results of the two sessions of Delphi Panel Survey are provided along with a discussion of the findings for each of the “XCGPMI” (Cross Cultural Global Project Management Intelligence) aspects and dimensions in this thesis.

The results were that the hypotheses were confirmed overall with no dimension being either weakly confirmed or rejected which fully validates the hypothesis. The connection to the GLOBE Survey cultural dimensions was also confirmed. A model is presented to summarize the findings of the thesis, called the “Cross Cultural Global Project Management Intelligence (XCGPMI). The significance of the result is that the “XCGPMI” model can provide a framework for cross cultural project management in Global context. Whether the team project members are working in the home country at one extreme, or working as expatriates with teams in multiple countries, at the other extreme, the same knowledge dimensions can be utilized to overcome cultural uncertainties and manage the projects. The “XCGPMI” model also provides the framework for developing and teaching Global project management skills in a cross cultural context thus reducing the incompleteness of knowledge in this regard and eliminating at least
some of the associated uncertainties. This would improve the effectiveness of the project management enhancing the possibility of project success. The model provides a simple outline of cross cultural project management attributes that can be utilized to structure assessment and training for management project professionals in a consistent and systematized manner. For the model, it does not matter if the Project Management practitioner was born in India and raised in the USA, or born in the USA and raised in Japan since it is a universal etic template. So training for cross cultural project management skills in Malaysia or Botswana can be structured in the same way, with the emphasis on the XCGPMI knowledge dimensions.

The model also provides a structure for future research and testing. For example by testing a group of project executives from a number of cultures for the importance of any of the knowledge dimensions/sub descriptors, the relationship of the relevant XCGPMI dimension can be linked and further explored. Future research can be connected back to XCGPMI Model to further amplify and confirm/reject the descriptors and sub-descriptors. Also, research on metrics for evaluation of cross cultural training for project management can utilize the Delphi panel scores as a benchmarking system.

This research would add value to PMBoK (Project Management Body of Knowledge) as an essential skill set for the international project management. There are many areas/avenues opened up to conduct further research in this area.

The first research topic needs to be focused on metrics for evaluating and training on XCGPMI Knowledge skills for project management professionals. Another interesting area opened up for further research is to capture a database linking live projects cross cultural issues to the ‘XCGPMI’ dimensions and attributes and develop a sort of hand book with possible approaches/solutions/methods to overcome specific cross cultural uncertainties in particular project set ups. This would need time to be developed and multiple research efforts spawning different project set ups with different cultural backdrops.

An attempt to apply the model cutting across organizational and industry boundaries could be taken up as a potential research area to develop and customize sub models specific to industries to initiate project management development processes. Another important area of research work opened up is to develop learning/training processes to mandatorily arm the project management professionals and based on its merit could be even considered /stipulated as an essential qualification required for international project management.

Author’s goal was to highlight the capstones and trendsetters to the best of his ability within the time available. The work is limited by the context and confines of this doctoral research program and resources available, and is not intended as a panacea for solving all of the issues related to cross-cultural project management. What the Cross-Cultural Global Project Management Intelligence (XCGPMI) model offers is a codified structure for helping Project management Professionals in multicultural environments, to assess their cross-cultural management skills and improve their performance. Author hopes, in the future it will provide a tool for establishing metrics that can be used for evaluation and training.