A Perceptual Analysis of English Language Skills in the Field of Petroleum

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A Perceptual Analysis of English Language Skills in the Field of Petroleum

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ABSTRACT

The purpose for this descriptive research study was to determine whether or not Equatorial Guinean apprentice students who completed the WNAP with an ESP component incountry received an overall satisfactory perceptual language proficiency which enabled them to effectively

perform their duties offshore. To accomplish this purpose, a review of selected literature was conducted, survey data from MEGI employees currently working offshore in operations was analyzed, and related conclusions and recommendations were formulated. Data produced from a survey of MEGI employees currently working offshore in operations supported the hypothesis that: Equatorial Guinean apprentice students who completed the WNAP with an ESP component in-country received an overall satisfactory perceptual language proficiency which enabled them to effectively perform their duties offshore.

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CHAPTER 1

Introduction

Background for the Project

In Equatorial Guinea (EG) West Africa, ExxonMobil developed and implemented a competency-based nationalization program which offered various training components that ensured an integrated local workforce met standards expected from its employees offshore.

English was the primary language used in the workplace environment both onshore and offshore. To meet the needs of the oil and gas industry and the increased need for highly skilled and trained industry, an intensive specialized English language training component played an integral part in determining success in the field.

The Workforce Nationalization Apprentice Program (WNAP) was designed specifically to develop trainees' level of proficiency to effectively perform their duties. This English for Specific Purposes (ESP) component of the program ensured instruction targeted the language related to communication skills and

applied technical skills training. The background and purpose of the ESP component had to be clarified and justified as a means of obtaining that language proficiency level.

The movement toward teaching English for Specific Purposes (ESP) grew as international recognition for the English language as a medium of communication in science, technology, and commerce, was established. "By the 1980's, in many parts of the world a needsbased philosophy emerged in language teaching, particularly in relation to ESP and vocationally oriented program design" (Brindley, 1984). After a needs assessment, Stufflebeam, McCormick, Brinkhoff and Nelson (1985) highlighted the importance as "the process of determining the things that are necessary or useful for the fulfillment of a defensible purpose" (p. 16). The ESP concept of instruction was further supported and defined as "an approach to language teaching, course design and materials development in which all decisions as to context and method are based on learners' reason for learning" (Hutchinson and Waters, 1987, p.19).

Prior to the implementation of the ESP component, ExxonMobil conducted all nationalization training, including English language immersion, at Southern Alberta Institute of Technology (SAIT). This was not cost effective and did not meet the quota demands of the Equatorial Guinea government. Therefore, research supporting WNAP had to be proven, and apprentices' perception of the ESP component being satisfactory was absolutely necessary.

Statement of the Problem

The technical and language training at SAIT was not cost effective and could not meet the government's demand for local personnel to fill a specific percentage of available positions within a limited period of time. Prior to the development and implementation of the WNAP, only 13 Equatorial Guinean nationals had been trained and were working offshore. Consequently, the government of EG was pressuring ExxonMobil to fulfill their contractual obligations to

employ 100 nationals by imposing visa restrictions and financial incentives to comply. Technical instruction, training equipment, and facilities were accounted for and proved to be sufficient for training needs.

The problem which represented the focus of the present study may be stated as follows: 1) Did the ESP component of the WNAP satisfy the English language needs of graduating apprentice students working offshore? 2) Were the apprentices' English language skills sufficient, from their perception, to work effectively?

Purpose of the Project

The researcher (Patrick Poppe) sought to prove that the ESP component of the WNAP enabled graduating apprentices to safely and effectively perform their duties. The purpose of this descriptive/survey research study was to determine the perceptions of Apprentice II students currently employed by Mobil Equatorial Guinea Incorporated (MEGI) with respect to English language skills learned and required to work in the petroleum industry.

Delimitations

Baseline data utilized in the present study was obtained from a survey of 23 MEGI Apprentice II graduating class of 2003. Participants were Equatorial Guinean nationals. The materials reviewed were compiled by the researcher for the explicit use of this project. The survey had time restrictions due to the researcher's schedule and students' availability, and further data was not available in time to be included in this report.

Assumptions

The researcher assumed apprentices would be eager to share their perception of the ESP program and had acquired the minimal amount of English necessary to perform duties offshore. A further assumption was made that in-country managers would assist in the study because it had the best interests of the company in mind.

Hypothesis or Research Question

As the oil and gas industry expanded, emerging international markets for future growth opportunities

increased. The need for highly specialized training programs, within host countries, to build a nationalized workforce became a necessity. The success of a specialized training program for the petroleum industry depended greatly on an English language component. The researcher hypothesized that Equatorial Guinean apprentice students who completed the WNAP with an ESP component in-country received an overall satisfactory perceptual language proficiency which enabled them to effectively perform their duties offshore.

Significance of the Project

The intent of the WNAP spanned the entire nationalization process, from early recruitment and assessment of local candidates to training and ongoing competency assurance activities. ExxonMobil's approach to workforce nationalization accomplished more than just the reduction of the number of positions filled by expatriates. The competency-based nature of the nationalization program's various training components ensured the local workforce met and exceeded high

quality standards mandated by offshore production facilities.

The researcher chose to defend and justify this project to emphasize the importance of an ESP component of training. Not only was it imperative that the cost of training be reduced, but the quality of language instruction had to be maintained.

Previous apprentice training had presented significant problems. First, Equatorial Guinean students had to be relocated to SAIT in Canada, which was a logistical nightmare; visas had to be arranged, travel expenditures were vast, and tuition for trainees residing of the premises enormously expensive. Second, apprentices needed to be tracked and supported while training was being conducted. If grades or academics dipped below standard, time and expenses for training were lost. Third, SAIT could only accompany a limited number of students at given times of the year. In addition, start and stop times were set and inflexible to the company's needs.

immersion program, the targeted language proficiency level was not being met. The primary obstacle to language learning was due to cultural and social adjustments which led to apprentices grouping together socially, defeating the principle of English language and cultural immersion. Finally, there were problems of flight. Some students simply chose to illegally immigrate and disappear, putting the burden of accountability on ExxonMobil.

The solution was clear, and an in-country workforce nationalization apprentice program was established. A significant concern, however, was whether the ESP component of the WNAP would meet the language needs to work safely and effectively offshore. Although proficiency and assessments showed those language needs had been met, the researcher sought to confirm those findings and examined the perceptions of graduating apprentices working in the field in offshore operations. If results showed that perceptions fulfilled language needs, then further workforce nationalization programs with an ESP

component would be justified and could be adopted worldwide.

Procedure

Procedures employed in the present study evolved in several stages, including:

- 1. Since 2003, while employed as an English instructor with ExxonMobil, the researcher made the determination to undertake this study after having observed certain English language limitations.
- 2. During 2004 and 2005, a review of selected literature as detailed in Chapter 2 was conducted to obtain in-depth information related to ESP.
- 3. After an extensive literature review, in 2006 a questionnaire survey was designed to be circulated to field managers.
- 4. In 2007, the questionnaire survey was sent to field managers, which was then forwarded to apprentices working in the field.

- 5. During Spring 2007, questionnaire survey results were tabulated and analyzed to formulate related conclusions.
- 6. An examination of the apprentices' perceptions was then conducted to determine whether or not their English language needs to work safely and effectively was met.

Definition of Terms

apprentice. A student who participated in a three year intensive technical training program and intended to be employed in a trade.

apprentice program. A three year technical training program specifically designed for a trade.

descriptive research. Data analysis techniques enabling the researcher to meaningfully describe many scores with a small number of numerical indices.

English for Specific Purposes. An approach to language learning based on learner need.

<u>in-country managers.</u> Managers of department within a United States company that operated abroad.

language immersion. An approach to learning in which the language of the environment was not native to the student.

nationalization program. A program to teach,
train, or educate a host country's local population.

<u>need.</u> Need was determined by the difference between what a learner could do previous to training and what he or she had to be able to do.

offshore. Oil rigs and vessels that were targeted for employment in the field of petroleum.

onshore. Workplace environments, including refineries, where petroleum field employees work on land.

Acronyms

EG. Equatorial Guinea

EAP. English for Academic Purposes

EBE. English for Business and Economics

EOP. English for Occupational Purposes

EPP. English for Professional Purposes

ESP. English for Specific Purposes

ESS. English for Social Studies

- EST. English for Science and Technology
- **EVP.** English for Vocational Purposes
- MEGI. Mobil Equatorial Guinea Incorporated
- SAIT. Southern Alberta Institute of Technology
- WNAP. Workforce Nationalization Apprentice

Program

CHAPTER 2

Review of Selected Literature

Introduction

This review of selected literature pertaining to the research study sought to reinforce the different aspects of the English for Specific Purposes (ESP) component of the Workforce Nationalization Apprentice Program (WNAP), and identified an approach to obtain the perception of need. The literature review was organized to address the following research topics:

- English as a Second Language: Program Challenges
- English for Specific Purposes: An Overview
- English for Specific Purposes: Essential Elements
- English Program Needs Analysis

English as a Second Language: Program Challenges

Initially ExxonMobil was faced with many problems in training Equatorial Guinean nationals because English as a Second Language (ESL) programs in the United States and Canada offered little to address the needs required in the petroleum industry (Basturkmen, 1998). Previous ESL programs were designed in

English-speaking countries where students learned
English as a second language in the environment of
native speakers where there was a general need to use
English for communications, study, and work (Sifakis,
2003). Examples included adult programs in
communities and community colleges in North America,
where students were permanent residents (immigrants
and refugees) but did not speak English as a first
language (Lincoln, Rademacher, Barber, 2006). The
ESL curriculum, course books and teaching was
determined by the needs of students for whom English
would become a primary language (Kachru, 1992), and
therefore did not meet the specific purposes of
potential oilfield personnel (Basturkman, 1998).

Students who studied in ESL programs also experienced language shock (Olsen, 2000). This term described the phenomenon that was experienced when adjustments were being made to a new English speaking and foreign environment (Buttaro, 2004). Laurie Olsen pointed out it was a common occurrence in schools, where, despite their desire to speak English fluently,

students struggled for several years until their anxiety passed. The feeling was further intensified by other peers who mocked them because of the way they spoke English (2000).

Studies have indicated that the anxiety created by language shock resulted in greater difficulty in performing well academically, especially when trying to learn the new language. As Stephen Krashen (1983) noted:

When a student experiences high stress, the affective filter is switched on, and the student will have difficulty in acquiring the new language. When the affective filter is down, language acquisition occurs more efficiently and quickly. Lack of motivation and self-esteem are also factors that trigger the affective filter and so prevent students from learning their new language. Therefore, educators need to provide an environment that reduces stress and anxiety and also increases immigrant students' motivation and self-esteem (p. 34).

Also, research showed new language learners were likely to be successful if encouraged to embrace their own culture as they learned the language (Kachru, 1997). Most ESL programs in North America went against theory which encouraged adding to existing language through culture, rather than to exchange their own for the new one (Cummins, 1996).

Lucia Buttaro argued that traditional views of adult motivation and participation were limited because they did not address the complex relationships among adult learners' identities, the social contexts of their daily lives, the classroom context, and investment in learning English (2004). By focusing on the experiences of Hispanic women, this research suggested the value of investigating the variety and commonality of adult experience within a single ethno linguistic group. The findings went beyond social identity to address issues of cultural identity relevant to understanding participation in adult ESL programs. This analysis showed how shifting identities of these women at home and as current or future

workers, and the ways these identities were connected to the work of the classroom, have much to do with their investment in participating in particular adult ESL programs (Buttaro, 2004).

United States Census numbers indicated English language learners in the United States increased nearly 72 percent in 10 years. In the Washington D.C. area alone, they accounted for one-fifth of the area's population older than five in 2000. In Northern Virginia, one-fourth of the population spoke a language other than English at home. Their numbers jumped nearly 90 percent in 10 years. Statistics showed that adult ESL programs in America cannot keep up with the demand (Reeves, Bennett, 2002).

Kevin O'Donnell and Chris Chapman reported that the United States Department of Education counted 1.2 million adults enrolled in public English programs in 2005, about one in 10 of the 10.3 million foreign-born residents 16 and older who speak English less than sufficient, or not at all, according to census figures from the same year (2006). Private ESL programs in

the United States were few and grossly expensive to international companies seeking to further the language development of employees required to learn English (Colten, 2006).

Research showed what ExxonMobil had seen, an English as a Foreign Language (EFL) program would better benefit and prepare Equatorial Guinean apprentices for the workforce language transition.

English for Specific Purposes: An Overview

The demand for learning English as a means of international communication varied throughout different industries in past years. The Oil Crisis of the early 1970s resulted in Western money and knowledge flowing into the oil-rich countries (Johns, 1991). The language of this knowledge became English (Hutchinson and Waters, 1993).

The immergence of ESP programs worldwide to fit the needs of business, education, and industry brought five developmental stages (Chanloner, 2006).

Categorizing the concept of special language, the five stages were recognized as follows: Register analysis,

rhetorical or discourse analysis, target situation analysis, skills and strategies and learning-centered approach (Hutchinson and Waters, 1993).

Emerging from the late 1960's, special language was recognized when clear distinctions were analyzed between English of Electrical Engineering, English of Biology, and General English (Hutchinson and Waters, 1981). A first stage enacted a register analysis that was conducted by examining grammatical and lexical differences. Specifics were prioritized according to what students' language needs would be based upon the field of study (Berwick, 1989).

The study of linguistics introduced a second stage of development termed rhetorical or discourse analysis. By dissecting sentences and deciphering how combined discourse produced meaning, patterns in texts and how they were organized were the main concerns (Johns, 1991).

The third stage, target situation analysis looked at reasons language learners chose to learn.

Specialized language forms related to targeted themes

were examined, and procedural steps to address the needs emphasized (Song, 2006).

The skills and strategies stage and fourth "considers not the language itself but the thinking processes that underlie language use" (Hutchinson and Waters, 1993, p.13). The skill centered approached explored areas that enable us to retrieve meaning from discourse, including common reasoning and interpreting processes based on contextual information or visuals.

The fifth stage, unlike the others, focused on upstanding the processes or language learning rather than the analysis of language use (Hutchinson and Waters, 1993).

English for Specific Purposes: Essential Elements

As the immergence of ESP as an approach evolved, all characteristics became based upon identifying and addressing the needs of particular groups of learners to learn (Johns, Dudley-Evans, Tony, 1991). Teaching content and method was then entirely built on this concept (Hutchinson and Waters, 1993). An ESP component required careful research and design of

pedagogical materials and activities for an identifiable group of learners within a specific learning context (Johns and Dudley-Evans, 1991).

To further define the parameters of ESP as an approach to language instruction, a need to distinguish between two variable and four absolute characteristics was established (Strevens, 1988).

Variable characteristics held that instruction may be "restricted as to the language skills to be learned (e.g. reading only) and it is not taught according to any pre-ordained methodology" (p.1).

Absolute characteristics consisted of English language teaching which,

. . . designated to meet specified needs of the learner; it is related in content (i.e., in themes and topics) to particular disciplines, occupations and activities; and it is centered on the language appropriate to these activities in syntax, lexis, discourse, semantics, etc.

(Strevens, 1988, p.2).

For the purpose of the present study, ESP was broken down into sub-categories. Two types of instruction were primary: English for Occupational Purposes (EOP) and English for Academic Purposes (EAP).

Courses in EOP trained individuals to perform on the job, using English to communicate (Dovey, 2006). Examples included courses designed for airline pilots, or hotel staff that needed English to perform their professional duties (Aiguo, 2007).

English for Academic Purposes (EAP) was built on a study skills focus such as academic writing, listening to lectures, note-taking, making oral presentations, which enabled one to succeed in English-language academic settings (Hyland, 2002). The EAP courses generally targeted students planning to enroll in a university in the United States (Johns, Swales, 2002).

English for Occupational Purposes branched off into English for Professional Purposes (EPP) and Vocational Purposes (EVP). English for Academic

Purposes, on the other hand, separated further into sub-categories entitled English for Science and Technology (EST), English for Business and Economics (EBE) and English for Social Studies (ESS) (Stevens, 1988). Johns (1991) provided a model for instruction in English widely used:

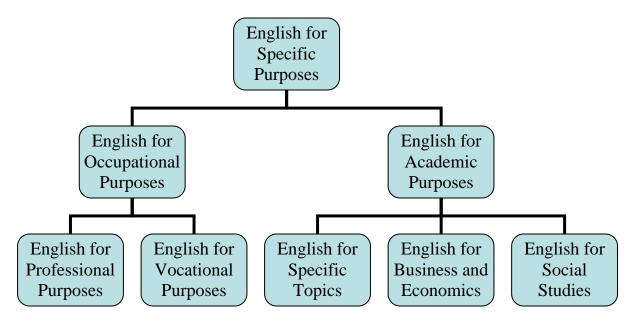


Figure 1: Categories of English for Specific Purposes

Brian Chanloner contended that a key part of ESP courses or programs, which focused on situational language, was the interpretation of results from needs analysis of authentic language used in target workplace settings (2006).

English Program Needs Analysis

To further support an ESP approach to language learning, the concept of need had to be clarified.

Determining need required researching how literature defined it and various definitions were presented throughout past years. One notable author saw need as "a gap between real and ideal conditions that is both acknowledged by community values and potentially amenable to change" (Widdowson, 1998, p. 3).

Widdowson looked at conditions within a community to clarify gaps between what was real and ideal. The importance of narrowing the gap, as acknowledged as need by the community, then could be addressed and met. Most importantly from this viewpoint, a gap had to be amenable to change (Widdowson, 1998).

With a focus more on language, Berwick (1989) saw need as a gap in what learners had to have and what they actually received in language programs. Berwick examined the inconsistency between what was the expected and what was being taught. Therefore, determining the learners' ultimate expectation in

achieving the end goal was essential in defining need (Berwick, 1989).

Assessing needs enabled educators to obtain valid and reliable information which was much more useful in targeting specifics in language (Chambers, 1980).

A needs assessment provided a means by which language instruction programs could adjust and adapt to the demands of a particular client or industry (Richards, 2001), for example:

- To find out what language skills a learner needs in order to perform a particular role
- 2. To help determine if an existing course adequately addresses the needs and potential students
- 3. To determine which students from a group are most in need of training in particular language skills
- 4. To identify a change of direction that people in a reference group feel is important
- 5. To identify a gap between what students are able to do and what they need to be able to do

6. To collect information about a particular problem learners are experiencing (p.52).

The information gathered distinguished ESP from General English instruction because it focused on an awareness of need. A flexible and responsive curriculum determined by an instructor's assessment led to ESP as an attractive learning alternative (Richards, 2001).

In order to obtain answers about the ESP component of the WNAP, the decision was made to carry out a deficiency analysis. Such an analysis provided the most common and useful approach to analyzing needs according to many ESP experts (McKillip, 1987). Most importantly, a deficiency analysis enabled the researcher to determine the target language skills and also the extent to which students had already developed those skills. The results accounted for the gap between the target and present needs of the students (Johns, Swales, 2002).

Summary

The review of selected literature presented in Chapter 2 supported the following research themes:

- 1. ExxonMobil was faced with many problems in training Equatorial Guinean nationals because English as a Second Language programs in the United States and Canada offered little to address the needs required in the petroleum industry.
- 2. Globalization and international business and commerce brought upon a demand to readdress language programs in the United States and abroad to meet the specific demands.
- 3. English for Specific Purposes programs further divided into essential elements targeting language learners' needs in academics and occupational settings.
- 4. Specific language programs were tailored to specific industries based upon occupational needs. Curriculum and instruction were

developed after conducting a needs assessment and needs analysis.

CHAPTER 3

Methodology and Treatment of Data

Introduction

The purpose of this descriptive/survey research study was to determine the perceptions of Apprentice II students currently employed by MEGI with respect to English language skills learned and required to work in the petroleum industry. To accomplish this purpose, a review of selected literature was conducted to justify the ESP component of the WNAP.

Chapter 3 was divided to systematically organize the treatment of data: (a) methodology, (b) participants, (c) instruments, (d) design, (e) procedure, (f) treatment of data, (g) summary.

Methodology

To test the researcher's hypothesis, a collection of numerical data was obtained from a questionnaire survey of WNAP graduates currently working offshore in oilfield operations. The 23 MEGI employees that participated in the present study were chosen because:

(1) They had successfully completed the three year

WNAP from 2003 - 2006; (2) At the time the questionnaire was dispersed, they were actively working offshore in petroleum operations. Apprentices were sent the questionnaire in the form of a survey in March, 2007, and the results were examined in April, of 2007, to determine their perceptions regarding sufficiency of language skills learned.

Participants

All surveyed were Equatorial Guinean nationals and MEGI employees. Those that participated in the present study included 23 post apprentices whom completed the WNAP during 2003 - 2006, and were working offshore in the petroleum industry. Of the 23 participants, 11 were working on the oil platform JADE; 12 were working on the extraction vessel Zafiro. Instruments

Questionnaires in the form of an e-mailed survey were used to obtain baseline data for the present study. The survey was developed by the researcher with the assistance of the MEGI Training and Development (T&D) in-country Manager. The MEGI T&D Manager

contacted offshore operational managers on JADE platform and the Zafiro vessel who supervised graduating apprentices of the WNAP currently working in the field. The offshore operational managers then conveyed what language skills were vital for employees to possess to effectively perform duties required for given positions. Language areas were then categorized and specific skills identified. The draft questionnaire was then e-mailed to the researcher for further revision. Afterwards, a peer review of the questionnaire survey was conducted by colleagues and Heritage College's Chair of Professional Development Program of the College of Education & Psychology, to account for issues of validity.

The questionnaire survey distributed offered questions in which students read instructions, then answered specific questions related to the English language skills required to work offshore.

Apprentices answered Yes and No questions pertaining to whether they perceived those specific language skill areas were met after completion of the WNAP.

The questionnaire survey provided a means for measuring the perceptions of apprentices regarding speaking, listening, writing and reading Enlgish language skills required offshore in oilfield operations.

Design

The questionnaire survey was sent in March, 2007, via e-mail to apprentices who graduated from MEGI's WANP and were currently working offshore in the field of petroleum. In April, of 2007, the apprentices received, completed, and sent back the questionnaire. Procedure

The study was conducted in several stages.

First, the researcher obtained permission from Rudy

Gonzalez, MEGI T&D Manager, to survey WANP Apprentice

II students working offshore. Second, with the

assistance of offshore operational managers and the

T&D manager, a questionnaire was developed targeting

English language skills required to effectively

perform offshore workplace duties. Third, during

March, 2007, field managers were sent the

questionnaire survey to be forwarded to participants via e-mail. Fourth, a review of selected literature was conducted to clarify and outline reasoning for the present study.

In April, 2007, participants received, completed, and returned the questionnaire survey. After receiving 78 percent of surveys sent, in April, 2007, the researcher analyzed the data collected and presented data incorporated in Chapter 4. Due to restrictions on not being able to be on-sight offshore on JADE and the Zafiro, English language skills predetermined by offshore operational manager could not be substantiated. Also, because the researcher was not in a position to assist in the administration and collection of the survey, only 78 percent of data was received.

Treatment of the Data

The data collected for the present descriptive study involved a tabulation and presentation of frequency and percentages (%). Results of the data analysis were reported in Chapter 4.

Summary

Chapter 3 provided a review of the following topics used in the present study (a) methodology, (b) participants, (c) instruments, (d) design, (e) procedure, (f) treatment of data, (g) summary.

CHAPTER 4

Analysis of the Data

Introduction

The present descriptive study included survey research to determine the perceptions of graduating WNAP apprentices regarding the ESP component's language preparation for the petroleum field workplace environment.

Description of the Environment

Participants were EG nationals currently living and working in Equatorial Guinea. Because the participants were MEGI employees working offshore, a 28 day on-duty and 28 day off-duty assignment was recognized. Baseline date utilized in the present study was obtained from a survey of 23 apprentices who were working offshore in March and early April. Due to the work environment, the researcher's schedule, student's availability, and time constraints, further data was not available and included in this report.

Hypothesis or Research Question

The researcher contended that Equatorial Guinean apprentice students who completed the WNAP with an ESP component in-country received an overall satisfactory perceptual language proficiency, which enabled them to effectively perform their duties offshore.

Results of the Study

From a total of 23 questionnaire surveys e-mailed to participants, responses were received from 18 (78%) and were included in the analysis of data.

Tables 1 through 5 provided a summary of responses to questions concerning perceived effectiveness of the ESP component of the WNAP.

Perceptions of instruction and 4 skills (speaking, listening, writing, and reading) language acquisition are as follows:

Research Question 1: Based upon the English language training you received, how would you rate your overall English language skills for the job?

Of the 18 participants surveyed, 18 or 100% perceived their overall language skills to be

satisfactory to perform their jobs effectively offshore.

Table 1.

Perception Percentages of Responders to Overall English Language Skills Instruction Received

Language component	<u>8</u>
Speaking	100%
Listening	100%
Writing	100%
Reading	100%

Research Question 2: Pertaining to effective job performance, which of the following specific speaking activities/functions does your job require further language training?

As indicated in Table 2, from 18 to 18 of MEGI employees surveyed considered their speaking skills listed in the questionnaire to be satisfactory to performing their jobs offshore in oilfield operations. Regarding general work-related communication, responses were as follows: asking and answering basic questions (100%); seeking further clarification

(100%); describing problems (94%); giving instructions (83%); explaining a process (94%); rephrasing information to facilitate understanding (88%); perceived their specific speaking skills satisfactory. Regarding telephone and radio skills, responses were as follows: leaving and taking messages (100%); checking and confirming details (100%); placing and receiving orders (100%); responding to emergency situations (100%); perceived their specific speaking skills satisfactory. Regarding language used in meetings, responses were as follows: making suggestions (100%); expressing solutions and benefits (88%); leading a discussion (83%); delivering technical presentations (78%); perceived their speaking skills satisfactory.

Table 2.

Satisfactory Perception Percentages of Specific Speaking Skills Related to Further Language Training

Specific Speaking Skills	<u>%</u>
General work-related communication	
Asking and answering basic questions	100%
Seeking further clarification	100%
Describing problems	94%
Giving instructions	83%
Explaining a process	94%
Rephrasing information to	
facilitate understanding	88%
Telephone/Radio skills	
Leaving and taking messages	100%
Checking/confirming details	100%
Placing and receiving orders	100%
Emergency situations	100%
Meetings	
Making suggestions	100%
Expressing solutions and benefits	88%
Leading a discussion	83%
Delivering Technical Presentations	78%

Research Question 3: Pertaining to effective job performance, which of the following specific listening activities/functions does your job require further language training?

As indicated in Table 3, from 18 to 18 of MEGI employees surveyed considered their listening skills listed in the questionnaire to be satisfactory to performing their jobs offshore in oilfield operations. Regarding specific listening language skills, responses were as follows: understanding basic instructions (100%); understanding safety presentations and meetings (100%); comprehending content in typical workplace interactions (100%); comprehending content of technical discussions and meetings (83%); perceived their specific listening skills satisfactory.

Table 3.

Satisfactory Perception Percentages of Listening Skills Related to Further Language Training

Specific Listening Skills	<u>%</u>
Understanding basic instructions	100%
Understanding safety presentations and meetings	100%
Comprehending content of typical workplace interactions	100%
Comprehending content of technical discussions and meetings	83%

Research Question 4: Pertaining to effective job performance, which of the following specific writing activities/functions does your job require further language training?

As indicated in Table 4, from 18 to18 of MEGI employees surveyed considered their specific writing skills listed in the questionnaire to be satisfactory to performing their jobs offshore in oilfield operations. Regarding business correspondence, responses were as follows: using correct format and punctuation (72%); informing and making requests (83%); justifying an action (78%); editing of documents (72%); completing work related forms, invoices, and permits, (100%); perceived their specific writing language skills satisfactory. Regarding technical writing, responses were as follows: describing a technical operation (88%); writing procedures (94%); writing reports (100%); summarizing information from manuals (83%); summarizing detailed instruction (83%) perceived their specific writing skills satisfactory.

Table 4.

Satisfactory Perception Percentages of Specific Writing Skills Related to Further Language Training

Specific Writing Skills	<u>%</u>
Business correspondence: letter, faxes,	
Using correct format and punctuation	72%
Informing and making requests	83%
Justifying an action	78%
Editing of documents	72%
Completing work related forms	100%
echnical writing	
Describing a technical operation	88%
Writing procedures	94%
Writing reports	100%
Summarizing manual information	83%
Summarizing detailed instruction	83%

Research Question 5: Pertaining to effective job performance, which of the following specific reading activities/functions does your job require further language training?

As indicated in Table 5, from 18 to 18 of MEGI employees surveyed considered their specific reading skills listed in the questionnaire to be satisfactory to performing their jobs offshore in oilfield

operations. Regarding vocabulary, responses were as follows: understanding commonly used non-technical vocabulary (100%); understanding industry-related technical vocabulary (94%); perceived their specific skills satisfactory. Regarding comprehension of written material, responses were as follows: comprehending instructions, forms, and procedures to complete tasks (100%); comprehending main points and details of work-related correspondence (100%); comprehending manuals, technical materials, and reports (88%); perceived their specific skills satisfactory.

Table 5.

Satisfactory Perception Percentages of Specific Reading Skills Related to Further Language Training

Specific Reading Skills	<u>%</u>	
Vocabulary		
Understanding commonly used, non- technical vocabulary	100%	
Understanding industry-related technical vocabulary	94%	
Comprehension of written material		
Instructions, forms, procedures to complete tasks	100%	
Main points and details of work- related correspondence	100%	
Manuals, technical material, and reports	88%	

Summary

Chapter 4 provided an overview of the description of the environment, hypothesis, and results of the study. The results of the study supported the researcher's hypothesis that Equatorial Guinean apprentice students who completed the WNAP with an ESP component in-country received an overall satisfactory

perceptual language proficiency, which enabled them to effectively perform their duties offshore.

CHAPTER 5

Summary, Conclusions and Recommendations
Summary

The purpose for this descriptive research study was to determine whether or not Equatorial Guinean apprentice students who completed the WNAP with an ESP component in-country received an overall satisfactory perceptual language proficiency which enabled them to effectively perform their duties offshore. To accomplish this purpose, a review of selected literature was conducted, survey data from MEGI employees currently working offshore in operations was analyzed, and related conclusions and recommendations were formulated.

Conclusions

Based on the review of selected literature and major findings produced from the present study, the following conclusions were determined:

1. ExxonMobil was faced with many problems in training Equatorial Guinean nationals because English as a Second Language programs in the

- United States and Canada offered little to address the needs required in the petroleum industry.
- 2. Globalization and international business and commerce brought upon a demand to readdress language programs in the United States and abroad to meet the specific demands.
- 3. English for Specific Purposes programs further divided into essential elements targeting language learners' needs in academics and occupational settings.
- 4. Specific language programs were tailored to specific industries based upon occupational needs. Curriculum and instruction were developed after conducting a needs assessment and needs analysis.
- 5. Data produced from a survey of MEGI employees currently working offshore in operations supported the hypothesis that: Equatorial Guinean apprentice students who completed the WNAP with an ESP component in-country received

an overall satisfactory perceptual language proficiency which enabled them to effectively perform their duties offshore.

Recommendations

As a result of the conclusions cited above, the following recommendations have been suggested:

- 1. To address the specific language needs in the petroleum industry, in-country workforce nationalization programs with an ESP component similar to the WNAP should be implemented.
- 2. In order to meet the demand put upon language programs in the United States and abroad, restructuring existing programs is recommended.
- 3. To account for the wide variety of ESP areas and elements, programs recognizing the different objectives of academic and occupational settings should be addressed.
- 4. To tailor programs for specific industries based upon occupational needs, curriculum and instruction need to be developed after

- conducting a needs assessment and needs analysis.
- 5. Because data from the descriptive research survey support the researcher's hypothesis, it is recommended that ExxonMobil and other oil companies operating abroad adopt programs similar to the WNAP to fulfill the English language needs of host country nationals training for field operations.

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APPENDIX A

March 14, 2007

Mr. Rudy Gonzalez Training and Development Coordinator Abayak Training Center Malabo, Equatorial Guinea

Dear Mr. Gonzalez,

As we discussed in earlier conversations, I am currently writing my Master's degree thesis and request your assistance in collecting research information. The study is entitled, <u>A Perceptual Analysis of English Language</u> Skills in the Field of Petroleum.

The purpose of this questionnaire is to determine the perceptions of Apprentice II students currently employed by Mobil Equatorial Guinea Incorporated (MEGI) with respect to English language skills learned and required to work in the Petroleum Industry.

The findings could provide justification for further in-country English for Specific Purposes training components of the Workforce Nationalization Apprentice Program. Since you are currently employed as the Training and Development Coordinator, your cooperation in forwarding this survey for Apprentice II students to complete would greatly be appreciated.

Any information collected will be confidential and an analysis and full report will be made available to you upon request.

Please have Apprentice II students send completed questionnaires directly to my e-mail address by March 25, 2007: pmpoppe@yahoo.com. Thank you again for your cooperation.

Sincerely,

Patrick M Poppe Department of Education Heritage University

APPENDIX B

DIRECTIONS FOR COMPLETING THE QUESTIONNAIRE

This e-mail questionnaire has been organized into 4 major categories concerning English language skills utilized on the job in the petroleum industry. These categories are:

- 1. Speaking
- 2. Listening
- Writing
- 4. Reading

This is a Microsoft Excel document and can be downloaded, completed, and saved. In responding to each of these items, indicate with an "X" in the appropriate boxed space. Indicated boxes will show how each item applies to you personally, as a MEGI employee that has graduated from the Workforce Nationalization Apprentice Program.

After completing this questionnaire, reattach the document to an e-mail and return to the in-country Training Manager Rudy Gonzalez.

APPENDIX C

English Language Training Needs Analysis Questionnaire

Date:			Employer:	
Name of Apprentice:			Department:	
lob Title:	_		Work Location:	
Please complete the form be	low by selecting t	the appropriate box with an "X".		
_anguage Skills	8			
Based upon the English	h language tra	aining you received, how would	you rate your language sl	kills for the job?
		Not Satisfactory	Satisfactory	
Speak	ing			
Listen	ing			
Readi	ng			
Writing	٦			

Category #1: SPEAKING

Pertaining to effective job performance, which of the following speaking activities/functions does you job require further language training?

Yes	No

Category #2: LISTENING

	o effective job perfor uage training?	mance, which of the following listening activities/functions doe	s you job red	quire
Turtiler lange	dage trailing:		Yes	No
	a. Understand	ing basic instructions		
	 b. Understanding safety presentations/meetings 			
 c. Comprehension of the content typical workplace interactions 				
	d. Comprehen	sion of the content of technical discussions/meetings		
	#3: WRITING			
	o effective job perfor uage training?	mance, which of the following writing activities/functions does	you job requ	ıire
			Yes	No
	a. Business co	rrespondence - letter, faxes, email		
		Using correct format and punctuation		
		Informing and making requests		
		Justifying an action		
		Editing of documents		
		Completing work related forms - invoices, permits		
	b. Technical writing			
		Describing a technical operation		
		Writing procedures		
		Writiing reports		
		Summarizing information from manuals		

Summarizing detailed instruction

Category #4: READING

Pertaining to effective job performance, which of the following reading activities/functions does you job require further language training?

		Yes	No
a. Vocabulary			
	Understanding commonly used, non-technical vocabulary		
	Understanding industry-related technical vocabulary		
b. Comprehend	ding written material		
	Instructions, forms and procedures to complete tasks		
	Main points and details of work-related correspondence		
	Manuals technical material and reports		