A Study on Examining Nursing Journal Abstract

Eunpyo Lee[*]
(Eulji University)
Myeong-Hee Shin[**]
(Hannam University)

This paper examines nursing professionals' English abstract to learn their preferences towards tense and voice choices. A total of 24 abstracts, completed reviews to be published by the editorial board members of the Korea Industrial Nursing Association, were analyzed for the study. Each sentence in the four parts of the abstract (Purpose, Methods, Results, and Conclusion) was examined and classified into active/passive voices, and present/past/present perfect tenses. Verbs were then further identified to see which ones were commonly preferred to state the objectives of the study, methods, and to draw conclusions. Hedging expressions in Conclusion were also examined. The results of the present study revealed that Purpose was mostly (79%) stated in the past tense with slight use (17%) of the present tense in the form of 58% active and 42% passive voice whereas Methods were dominantly (96%) illustrated in the past tense with preference of mixed active and passive voice. The Results were also preferably (92%) stated in past tense and Conclusion in both present and past tense. Verbs used by these nursing professionals seemed diverse; however, hedging appeared to be narrowly limited to a few expressions including *suggest* and *should.* More diverse English hedging expressions need to be taught at least college level writing so that the EFL learners and writers can have a better understanding of presenting statements in an appropriate level of caution, confidence, or uncertainty.

[abstract/active and passive voice/present/past and present perfect tense/ hedging]

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[*] First author
[**] Corresponding author

I. INTRODUCTION

English abstract is an indispensible piece of writing for professionals of any academic majors in Korea even though the article is only partially conducted in the language. Amid compelling emphasis is placed on English writing, not just student learners but a number of researchers and scholars still feel uncomfortable with writing in English. For writers of English as a foreign language, it can be challenging to state clear ideas in a manner of which native speaking writers express using adequate tense, voice, appropriate verbs and hedging, especially in academic writing. Furthermore, ways of concluding what has been discussed in the study might be different from those of the native speaking writers.

There have been some research studies, especially in the last couple of decades or so, on tense choices in academic written discourse in English for Specific Purposes (ESP) and applied linguistics by Malcolm (1987), Gunawardena (1989), Shaw (1992) and Taylor (2001) to name a few.

However, Min (2010) pointed out that not many studies have dealt with tense choices in research abstract in humanities and social sciences as previous studies were limited to English research articles of Sciences and Technology. To broaden the research topic with abstracts in humanities and social sciences, Min's (2010) study was done on tense choices in research abstracts comparing Humanities & Social Sciences with Natural Sciences & Technology.

Abstracts are emphasized for clear, accurate statements as they present the "gist of the article in a precise and maximally efficient way" as Ventola (1997) indicated. Hyland (2004) stated that the abstract is regarded to be unique from other genres in its characteristics. Hyland further asserted that the way abstracts are written convinces the potential readers of the articles that the writers have the professional credibility to discuss their topic as an inside member, which ultimately could lead the readers to the associated articles.

This study is to examine nursing professionals' abstract to see what preferences are noted in terms of tense and voice choices by analyzing 24 abstracts that were reviewed and approved for publication by the editorial board members of the Korea Industrial Nursing Association. It is also to see if the results are any different from those of the previous studies. The research questions are as follows:

1) Which tense and voice choices are preferred in the nursing professionals' abstract and how different are the results compared with those of the previous studies?
2) Which verbs are commonly preferred to state the objectives, methods and draw conclusions?
3) What type of hedging is used for conclusion?

4) What implications can be obtained from the results regarding English teaching on abstract writing?

II. LITERATURE REVIEW

1. Tense Choices in Research Articles

There are numerous studies done with English of Sciences and Technology research articles, and they report that tense choice is governed by the demand of rhetoric functions of paragraphs (Heslot, 1980; Hanania & Akhtar, 1985; Gunawardena, 1989; Biber, Conrad, & Reppen, 1998). These studies showed tense choice in each part of the research articles in sciences and technology. Among them, Gunawardena (1989) reported that Introduction and Discussion are mostly presented in the present tense, while Methods and Results are in the past tense.

Similarly, Swales (1990) and Shaw (1992) did studies on the structural characteristics of sentences, and they observed that reporting verbs are likely to be expressed in the past tense whereas non-reporting verbs are likely to be expressed in the present tense. Researchers like Lackstrom et al. (1973) and Oster (1981) also investigated tense choices for reporting past research. Based on their results, the present perfect tense is preferred when the past research is important or general; however, the past tense is usually preferred when the information of the past literature is specific.

The results of tense choices in research abstracts are featured by the past tense according to Graetz's (1985) study and the present tense in Kaplan et al., (1994) and Kim (2008). Salager-Meyer (1992) reported that the present tense is used, though the past tense is dominantly used, to enhance the generalizability of the specific results or to express universal truth or established knowledge, and the present perfect tense is used to show the gap or disagreement with the previous research. According to Martin (2003), Methods and Results are mostly expressed in the past tense while Conclusion is mostly expressed in the present tense.

Korean researchers also did their studies on the tense choices in research articles. Lee (2004) reported that Introduction and Conclusion are generally expressed in the present tense or the present perfect tense whereas Methods and Results are expressed in the past tense. Slightly different results were reported by Park (2007) showing that Introduction, Purpose, and Conclusion are mostly expressed in the present tense but Methods are mostly expressed in the past tense.

2. Voice Choices in Research Articles

Voice has served as a powerful metaphor for addressing the complexity of how writers establish an authorial identity in their writing according to researchers like Elbow (1994), Yancey (1994), Clark & Ivanic (1997), and Ivanic (1998) to name some. In recent years, voice has been a research term in the journals of composition studies and applied linguistics.

A decade earlier, Ivanic and Camps (2001) expanded the role of voice by redefining voice as "self-representation" that is inherent in "all human activity" as well as writing. However, there were contrary studies from the focus on the importance of voice and authorial identity. A study done by Helms-Park and Stapleton (2003) demonstrated its irrelevance to academic writing by investigating the relationship between voice-related textual features and the quality of undergraduate argumentative writing, and expressed skepticism over the value of voice in academic writing. More recent study was done by Matsuda and Tardy (2007) in a simulated manuscript review, and they highlighted the role of voice in academic writing and elucidated the need of further research into authorial identity construction.

In Elbow's (1981) study, voice was characterized as an attribute that captures the sound of the individual on the page. Furthermore, voice was explained to carry individual or personal quality in writing. Relatively narrow set of discursive features such as assertiveness, reiteration of the main point, and authorial presence were said to be included in individualized voice.

3. Hedging

The notion of hedging in the research studies has also been a research term of English learning and teaching. The term, hedging, was explained by Lakoff in 1972 as making things fuzzier using epistemic modality, such as *may, might, should, can, could*, *must*, etc. Hyland (1994), Crompton (1997), and Hyland & Milton (1997) explained it as a suitable role to present statements in an appropriate level of caution or uncertainty. In Myers' (1989) study, hedging in scientific writing was explained as a politeness strategy.

According to Brown & Levinson (1978), Clemen (1997), and O'keeffe et al., (2007), hedging is viewed in terms of how the use of certain words or expressions can mitigate the directiveness and assertiveness of what we say and so operate as a face-saving device. The study of hedging within an EFL context by Flowerdew (2000) argues that the overall tendency of underuse of hedging devices in EFL learners' writings makes their writing too direct.

Hyland's (1996) study explored the types and the amount of hedging expressions in

cell and molecular biology research articles to nurture hedges in the ESL curriculum. Also in Korea, some studies have been done on hedging expressions for the past decade or so. Based on Hyland's study, Choi and Ko (2005) compared their results on hedging expressions with academic writing of Korean postgraduates. Lee (2007) did her study on hedging expressions of medical research abstracts revealing difficulties and limited usage of hedging in medical articles. Most of these studies indicated difficulties, yet necessities of using hedging expressions in research articles.

III. METHOD

1. Data

A total of 24 abstracts (12 in May and another 12 in November 2010) that were preliminarily reviewed by the editorial board members of the Korea Industrial Nursing Association and approved to be published were emailed to the researchers for abstract reviews. These articles were written in Korean except for the abstracts. They were thoroughly examined for the objectives of the study.

2. Analysis

Each abstract comprised of Purpose, Method, Results and Conclusion. All 24 abstracts were reviewed for individual part of the abstract by classifying into passive/active voices and present/past/present perfect tenses. The number of words used for each title was examined as well as the number of sentences used for each abstract. Verbs were then further examined to see which ones were most commonly preferred to state the objectives, methods, and draw conclusions. Hedging in Conclusion was identified to learn of the types and frequency of their hedging expressions. The results were then compared with those of the previous studies.

IV. RESULTS AND DISCUSSION

Upon examining Purpose, Method, Results and Conclusion of the abstract, preferences on the tense and voice were determined. The types of commonly used verbs and hedging expressions especially in Conclusion were also studied. The results and tables show what have been found from the 24 nursing professionals' abstracts.

1. Abstract Titles and Number of Abstract Sentences

The average number of words used for the 24 nursing abstract titles was 13. Seven-word-title was the shortest while 21 was the longest. As shown in the following table, 13 out of 24 abstracts (54%) had titles of 12 to 17 words whereas 7 abstracts (29%) had between 7 and 11 words titles. Only 4 abstracts (17%) had rather lengthy titles of 18 to 21 words.

TABLE 1

Number of Words Used for Titles

No. of Words	No. of Abstract	
7	3	
8	1	
9	1	
11	2	
[12]	[5]	+
[13]*	[1]	+
[14]	[2]	+
[15]	[1]	+
[16]	[2]	+
[17]	[2]	= 54%
18	1	
19	2	
21	1	

*the average number of words used for the title

TABLE 2

Number of Sentences Used for Abstract

No. of Sentences	No. of Abstract	
[7]	[5]	+
[8]	[6]	+
[9]*	[4]	+
[10]	[5]	=83%
11	3	
12	1	

*the average number of sentences used for the abstract

The average number of sentences used for these abstracts was 9 with the longest 12 sentences and the shortest 7. The majority (83%) of them were stated in between 7 and 10 sentences. Table 1 shows the number of words these 24 abstracts used for their titles and Table 2 reveals the number of sentences used for the abstract:

2. Abstract Purpose

All 24 abstracts in this study stated their purpose in the first sentence to introduce why the particular study had been done. For the purpose of the abstract, twenty of them (83%) were written in one sentence, three (13%) in two sentences and only one (4%) in three sentences. Of the 24, 13 abstracts (54%) were written in the active voice whereas 10 abstracts (42%) in passive, and one abstract (4%) in both active and passive voice combined. In the Purpose, the majority (83%) of the abstracts dominantly preferred one sentence and slightly over half of them (54%) stated their purposes in the active voice.

Most common verbs used to state the Purposes were *analyze, describe, examine, explore, identify, investigate,* and *measure*. Main clauses in the Purpose are as follows:

1) Purpose written in active voice, past tense:
   The study was to provide (analyze, confirm, describe, examine, explore, identify, investigate, provide) . . .
   The study targeted to investigate . . .

2) Purpose written in passive voice, past tense:
   The study was aimed to identify (investigate) . . .
   The study was performed to investigate, (intended to understand, conducted to measure (compare, estimate, investigate), and *done to investigate). . .*

3) Purpose written in active voice, present tense:
   *The study is to provide . . .*
   The study aims to describe . . .
   The study investigates . . .
   The study is to confirm . . .

Table 3 shows frequency of active/passive voice and present/past tense used in the Purpose of the 24 abstracts. It reveals the majority of the abstracts (79%) used past tense. However, both active voice and passive voice were preferred showing 14 active (58%) and 10 passive (42%).

TABLE 3
Frequency of Tense and Voice in Purpose

Frequency of Tense & Voice in Purpose

- Mixed Tense
- Past
- Present

Active   Passive   Total
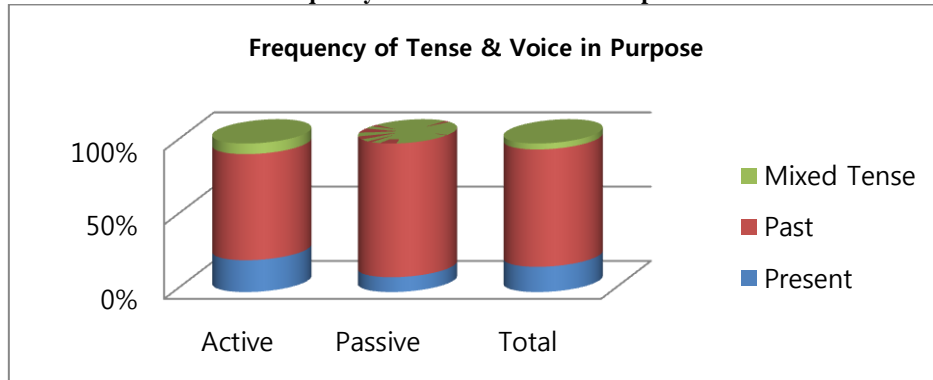
3. Abstract Methods

In this section of the abstract, the past tense was obviously most dominant among 23 out of 24 abstracts (96%) whereas only one (4%) abstract was presented in the present perfect. Evidently, no present tense was used in the Methods. Twelve abstracts (50%) were stated in the mixture of active and passive voice while 10 (42%) were in passive tense and two in active voice (8%).

TABLE 4
Frequency of Tense and Voice in Methods

Frequency of Tense & Voice in Methods

- Mixed
- Passive
- Active

Present   Past   Mixed   Total

Tense
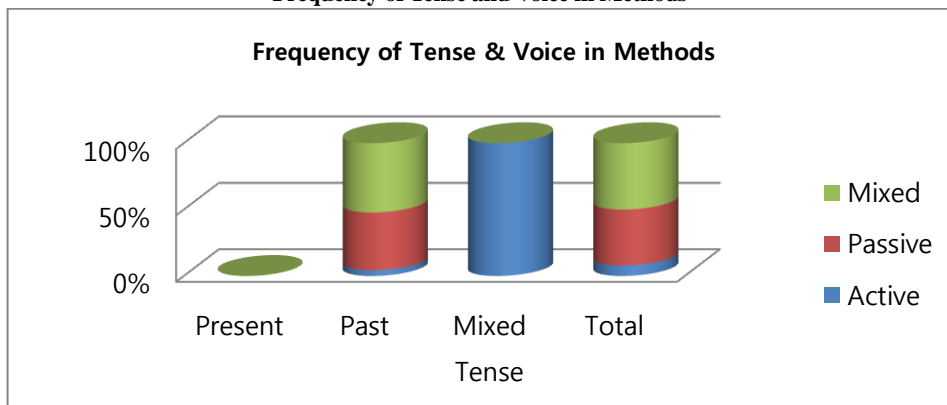
Verbs that were commonly used for Methods are as follows in the present form: *collect, analyze, do, respond, record, conduct, perform, include, answer, receive,*

administer, use, prepare, assign, agree, study, obtain, design, execute, recruit, measure, interview, categorize, establish, consist, complete, utilize, recognize, consist, select, modify, and *develop*. Table 4 shows frequency of tense and voice in Methods of the abstract.

4. Abstract Results

In this part of the abstract, passive-only voice was not used at all. Twelve abstracts (50%) was written in active and the other twelve (50%) were mixed of active and passive tense. The Results were neither stated in the present tense active voice nor present tense passive voice. However, there was only one present tense that was mixed of active and passive voice. The majority of them (92%) were stated in the past tense of either active voice (12 out of 22) or mixed voice (10 out of 22). The next table shows the frequency of tense and voice in the Results.

TABLE 5
Frequency of Tense and Voice in Results
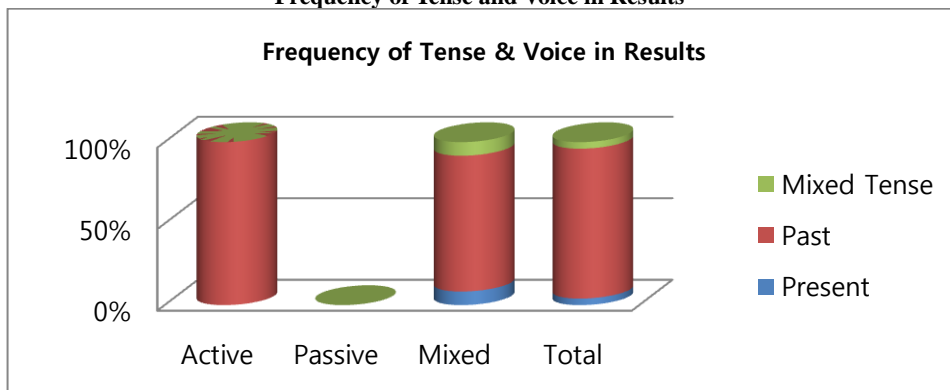
5. Abstract Conclusion

In the final section of the abstract, each verb was examined not only for tense and voice but also epistemic modality. For auxiliary verbs, use of *will* was considered future tense and all other modal verbs such as *can, could, may, might, must*, and *should* were considered hedging that expresses modality or temporal meaning to avoid any attack from the opposed viewers.

The following is the summary of concluding sentence of the 24 abstracts. Numbers in parentheses represent the number of abstracts stated in the expression.

Hedging expressions in Conclusion:
It is necessary (critical) to . . . (3)
We need to . . . (1)
The results suggest that . . . (4)
It is needed (suggested) to . . . (3)
It is associated with . . . (1)
. . . are needed . . . (1)
There should be (. . . should be considered) . . . (6)
*These results may attribute to . . . (1)*
The result indicates that . . . (1)
Nursing executives and unit managers concern on . . . (1)
It would reduce alcohol-involved accident . . . (1)

For conclusion of the abstract, use of present/past/mixed tense and active/passive/ mixed voice was noted. Unlike other parts of the abstract, about half of them were stated in mixed tense of present and past, and mixed voice of active and passive. Table 6 shows frequency of tense and voice preference in Conclusion of the abstract.

TABLE 6
Frequency of Tense and Voice in Conclusion
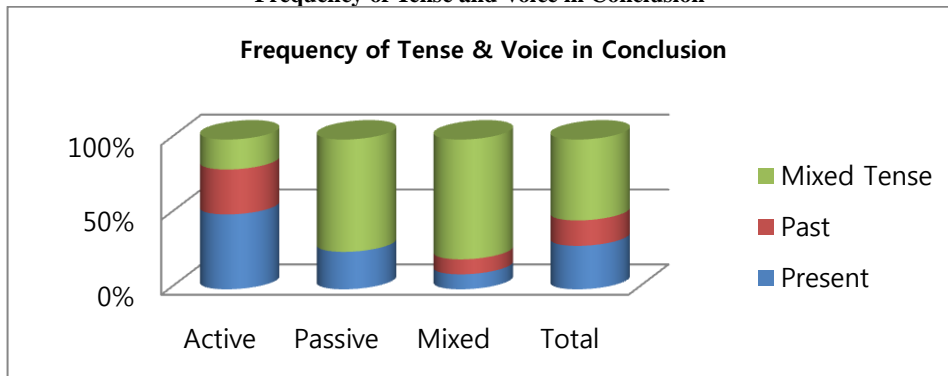
V. CONCLUSION

English abstract is essential even when the article is written in Korean as it is a required piece of writing for any academic article. English abstract also plays an important role in academic writing as it convinces the potential readers of the article that

the writer has the professional credibility to discuss the topic as an inside member, which ultimately could lead the readers to the associated articles (Hyland, 2004). In this context, an examination of abstract may be of meaningful especially in terms of tense and voice preferences in social science journals as such studies have not been extensively done yet.

Previous studies especially done by Gunawardena (1989) indicated that Introduction and Discussion are mostly presented in the present tense, while Methods and Results are in the past tense. Martin (2003) asserted that Methods and Results are mostly expressed in the past tense while Conclusion is mostly expressed in the present tense. Lee (2004) reported that Introduction and Conclusion are generally expressed in the present tense or the present perfect tense whereas Methods and Results are expressed in the past tense.

These previous studies seemed to agree that Methods and Results are mostly expressed in the past tense; however, Introduction (or Purpose) and Conclusion show some discrepancy in terms of tense. Past studies indicated that Introduction and Conclusion were expressed in the present tense.

Slightly different results are shown from the current study of the nursing professionals. Most (79%) of the Purpose were stated in the past tense either active (58%) or passive (42%) voice. As for Methods, the past tense was dominant (96%) in passive (42%) and mixed tense (50%). Results were also mainly (92%) stated in the past tense either active (50%) or mixed (50%). Conclusion was in the present, past, or mixed tense with wither active or mixed voice.

As voice was explained to carry personal quality in writing by Elbow (1981), assertiveness and authorial presence need to be included in individualized voice. However, in the nursing professionals' abstract, preference in the particular voice did not occur showing almost similar percentage of using active voice and mixed voice.

Regarding hedging expressions, there seemed to be a limitation of usage as one half of the abstracts (50%) relied on *should* and *suggest*. Another 5 abstracts (20%) were stated using *need to* and *necessary*. This overly simplified use of particular hedging can be considered a manifestation of not enough knowledge or usage of hedging expressions among Korean professionals. Inclusion of teaching variety of hedging expressions at least college level is necessary to produce suitable academic writing including abstract in an appropriate level of caution or uncertainty as Hyland (1994), Crompton (1997), and Hyland & Milton (1997) asserted and in a politeness strategy explained by Myers (1989).

This study has limitations of small sample size that are not enough to generalize what has been derived. More diverse professions with larger number of data may provide a better result on the topic. However, the results of limited usage in hedging expressions might add credibility as to more diverse teaching in hedging is required.

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APPENDIX

A sample of abstract

Objective: This study was conducted to compare health status, health problems, health promoting behavior, and risky environment according to industrial classification of factory workers. **Methods:** The subjects of this study were 1,075 workers in 43 companies which located in Daegu, Korea. Survey data were collected from April 28th, 2006 to May 17th, 2006. CMI Health Checklist was scored to estimate the health problems, Health rating scale for health status, HPLP II for health promoting behavior, and environmental risk assessment tool for risky environment. The data were analyzed by one-way ANOVA and Pearson Correlation Coefficient using SPSS 12.0 for Windows. **Results:** The results indicated a significant difference in health problems (F=4.70, p=.000), in health status (F=2.47, p=.022), in health promoting behavior (F=5.67, p=.000), and in risky environment (F=14.75, p=.000) according to industrial classification of the industrially classified factory. **Conclusion:** The results obtained in this study suggested that there is a need to develop customized health care programs for each company to provide differentiated health care to different types of work places. Further studies are required to estimate differences in work environment among different

types of work places and come up with measures to reduce harmful factors to the environment.

Key words: industry, health problem, health status, health promotion, environment

Examples in: English
Applicable Languages: English
Applicable Levels: Tertiary

Eunpyo Lee
Eulji University
Department of Medicine
143-5 Yongdu-dong, Jung-gu
Daejeon, Korea, 301-832
Tel: (042) 259-1613
Email: elee@eulji.ac.kr

Myeong-Hee Shin
Hannam University
Department of Academic Research
Ojeong-dong, Daedeok-gu,
Daejeon, Korea, 3-7
Tel: (042) 629-7451
Email: scindy@hnu.ac.kr