ABSTRACT

Higher order questioning (HOQ) benefits first language and second language learners in various ways. Various studies prove that asking students higher order questions open many learning avenues. Higher-order questioning (HOQ) influences the question types like test scores, amounts of language production for understanding the language abilities of students etc., This study examined:

- The HOQ patterns of a college teacher
- The teacher’s foundation for this pattern
- Learners perceptions of answering HOQ

The study comprised nearly 400 questions, teachers and students’ interviews. Students’ survey showed that HOQ may be effective by general theories of learning than by perceptions of learners’ abilities.

Keywords: Higher-order questioning, perceptions, practice

1. INTRODUCTION

Educators should implement curricula targeting these thinking skills (the mental processes of application, analysis, synthesis, and evaluation) for all students (Zohar & Dori, 2003). Thinking skills are important for learning a language but English language learners rarely receive higher-order thinking instruction (Au, 2006; Darling-Hammond, 1995; Dong, 2006; Gebhard, 2003) and required to pass high-stakes tests (Raphael & Au, 2005), compete in a global job market (Au, 2006), and initiate social change (Freire, 2004).

HOQ gives learners many advantages. HOQ develops literacy levels, (Taylor, Clark, Pearson, Walpole, 2000), thinking skills (Dontonio & Paradise, 1988), more language production (Brock, 1986; Farooq, 2007; Shomoossi, 2004). Though HOQ offers many benefits, most of the teachers never encourage higher order questioning to students, who have English as a second language, because they assume the intellectual abilities of students
before asking questions. This proves that some educators confuse language proficiency with cognitive ability (Harklau, 1994, 2000) and believe that second language [English] learners are unable to think deeply. Most of the students (especially with Tamil Medium background) are hesitant to answer higher-order questions and some students (English and Tamil Medium) are hesitant to participate in HOQ. The hypothesis of the study explores English language learners’ professed abilities to answer higher-order questions.

LITERATURE REVIEW

HOQ helps students to develop critical thinking and intelligence. It also helps to expand literacy success of students. HOQ are being asked to students with high confidence, which identifies the qualities of the teacher and the institution. By examining the relationship between HOQ and student achievement, HOQ impacts learning in general and literacy achievement in particular.

L1 studies categorize questions as higher-order and lower-order, while second language studies examine questioning in terms of referential and display types. Brown (2001) describes that referential questions include the skills of application, analysis, evaluation and synthesis. When students break the jinx of memorization HOQ occurs in the learning process.

Many studies have shown that HOQ leads to more learner output than lower order questions (Brock, 1986; Farooq, 2007; Long & Sato, 1983; Shomoosi, 2004; Suk-a-nake et al, 2003). HOQ makes the language class more interactive than the lower order question classes. The studies claimed student achievement (Redfield & Rousseau, 1981), literacy achievement (Taylor et al, 2000), or language production (Brock, 1986), and also investigated how teacher behaviors impact student production. This type of research, studies that “strive to account for student outcomes as a function of teacher behaviors” (Carlsen, 1991, p. 157), is termed as Process-product.

Students with high English proficiency level could answer all types of questions with confidence and students with less English proficiency level could find difficult in answering any sort of questions. There should be a good rapport between the teacher and the students, in case, students find uncomfortable and threatening, this may negatively impact students’ affective variables and hinder language acquisition (Krashen, 1985). Teacher’s perceptions play an important role in the delivery of challenging questions. Sometimes higher order questions help teachers to view students’ academic excellence rather than the cognitive skills which affect the teachers’ beliefs about students’ abilities.

In the literature reviewed above, a number of studies proved that HOQ positively helped learning process among students. In the Indian English language classrooms, sometimes teachers and students participate or
sometimes fail to participate in HOQ. In order to understand the reasons, this study was driven by the following research questions:

- HOQ or LOQ [low order questioning] should be encouraged in the classroom?
- Is using higher order and lower order questions in the classroom a beneficial?
- How do second language learners respond to higher order questions in the classroom?

METHOD

The respondents

The fifty respondents were from 1 year English literature from a semi-urban college, Chennai. Out of 50 respondents, 40 respondents studied English as a medium of instruction till higher secondary from government / government aided schools. 8 respondents had their schooling from ‘local’ private matriculation schools and 2 respondents from ‘good’ convent schools. All the respondents understand, write, read, English well but only a few respondents could speak English well.

Data collection and Analysis

With the aid of qualitative and quantitative study, data were collected from 50 respondents over a-three month observations. One month was used to observe the students behavior. The data included a student survey and student and teacher interviews. A participating professor was with 20 years of teaching experience in the same college. She had a master’s degree and M.Phil degree in English literature respectively.
Questions

During classroom observations, the teacher’s questioning patterns were observed and recorded on mobile phone. Following the observations, questions and responses were transcribed from the mobile and questions were coded into HOQ or LOQ (lower-order questioning) categories.

The teacher’s questions were categorized as HOQ based on the new information created by the students. Although various coding schemes were used, this method was based on the recommendations in the literature. For example, Renaud and Murray (2007) note:

Perhaps the clearest distinction between lower- and higher-order questions, as noted by Bloom (1956), is that while lower-order questions are designed to elicit existing answers (e.g., from the textbook, directly from the lecture), higher order questions require novel answers in that they cannot simply be recalled (p. 322).

While asking questions to acquire new information shows that they do not memorize answers. Higher order questions like: why the author described the incident in this way? Why did Wordsworth refer to nature as ‘she’? LOQ questions like where was Wordsworth born? What is nature? Precisely, if the teacher and students discuss and students ask questions and recite the information available from text books, it was coded as lower – order category.

After recording the teacher’s questions to students it was transferred on to a questioning chart according to following concepts.

- Question types (higher-order or lower-order)
- To whom the question to be asked (basic, medium, high level of students)?
- Who answered the teacher’s question (teacher, basic, medium and high level students)

A sample chart

<table>
<thead>
<tr>
<th>Question</th>
<th>Question type HOQ / LOQ</th>
<th>Question to be asked Basic/ medium/ high level of students</th>
<th>Question to be answered Teacher / basic/ medium/ high level of students</th>
</tr>
</thead>
<tbody>
<tr>
<td>Why did Wordsworth refer to nature as ‘she’?</td>
<td>HOQ</td>
<td>To all</td>
<td>High level (students with good English speaking skill)</td>
</tr>
</tbody>
</table>
This sort of charts would provide a percentage in order to present a holistic view of what types of questions should be asked by teachers to what set of students.

**Student Survey and Interviews**

After 10 hours of observation, a survey was distributed to the respondents with Likert-based Survey to understand the students’ perceptions of answering HOQ. The survey was conducted to find out the level of comfortable nature of students to face or answer HO questions. The survey would help to find out whether students would answer in small groups or not with survey statements by selecting never, sometimes or always.

**Teacher interview**

To analyze the researcher’s idea of framing HOQ with the teacher who handled the students and would know the level of intelligence and the new information of the students, an interview was conducted.

The interview served as a possible link between the teacher’s questioning perceptions (and her questioning practice) and the researcher’s analyses towards questioning.

**FINDINGS AND DISCUSSION**

The current study focused on three research questions. The aim of the study was to understand the HOQ contexts in English language classrooms in Tamil Nadu, India. The following discussion on

- HOQ or LOQ should be encouraged in the classroom?
- Using higher order and lower order questions in the classroom?
- How do second language learners respond to higher order questions in the classroom?

are analyzed in this study.

**RESEARCH QUESTION 1 - HOQ OR LOQ SHOULD BE ENCOURAGED IN THE CLASSROOM?**

The teacher answered many questions which carried 65% higher-order questions. When compared to other percentage it is at the higher end of the range (14% in Long & Sato, 1983; 18% in Shomoossi, 2004; 63% in Farooq, 2007; 70% in Wu 1993). The teacher concentrated and engaged more on the students with ‘good’ English (8 matriculation and 2 convent educated
students). However, when teaching a class, the teacher should consider the demographics of the class: 80 percent of the respondents were with ‘a little’ knowledge of English. This should be noted that the teacher should direct more of her questions to groups of students which comprise a higher percent of the classroom’s total population. The teacher should have equal number of questions to engage all set of students in the classroom so that not a single student would be diverted mentally from the class.

The percentage of using HOQ in the classroom not only shows to identify the types of questions to be asked in the classroom but also shows that HOQ involves student perceptions and the teacher’s decisions.

**RESEARCH QUESTION -2 IS USING HIGHER ORDER AND LOWER ORDER QUESTIONS IN THE CLASSROOM A BENEFICIAL?**

Teachers questioning is influenced by their perceptions of students’ abilities and some teachers differentiate their questioning depending upon these perceptions. While asking HOQ to competent students in the class, the so called ‘incompetent students’ performance would be overshadowed by the perceptions of the teacher. Teacher's perception of the good English speakers in the classroom would be tagged as ‘bright’. The brightness could be conceptualized as ‘cause and effect’ of the students. The brightness is the keyword whereas ‘thinking’ is the yardstick of learning and understanding the second language in a classroom. Students should be taught to think through reading, writing, speaking and listening. Teachers should engage all learners,
but see to it that high level learners should not be dragged to the level of low level learners at the expense of the teacher’s convenience. HOQ or LOQ should be distinguished by the teacher among her learners based on their learning styles, abilities and the difficulty of the content. Teacher should change her questioning patterns according to the heterogeneity of the classroom. Teacher should not differentiate questions according to the perceived cognitive levels of the learners.

RESEARCH QUESTION 3 - HOW DO SECOND LANGUAGE LEARNERS RESPOND TO HIGHER ORDER QUESTIONS IN THE CLASSROOM?

Some of the students are comfortable with HO questions in general, as the classroom settings make them to answer the questions. Teacher plays an important role to make students think with new concept and new information. Most of the students have trouble in articulating answers in English so they deter themselves in participating.

A set of questions had been asked students to understand the language and the perception of HOQ in the classroom
1. I am afraid to speak in English
2. I am afraid of answering difficult questions though I know the answer
3. Speaking in English makes me nerves.
4. I answer easy questions in English
5. I answer difficult questions in English when teacher insist me to do so
6. I can answer in English in front of the whole class
7. I can answer in English in small groups
8. I can answer well in English when teacher asks only me.
The survey shows that students of higher English proficiencies were not ready to participate in HOQ. 90.5 percent respondents claimed that they were nervous and afraid to answer higher order questions though they knew the answer. The data shows a clear trend – 75.4 percent of the respondents became increasingly comfortable answering challenging question in small groups and 96.4 percent of the respondents were more comfortable in one on one answering with the teacher. The respondents were more comfortable in small groups and in one on one with the teacher because some of their classmates speak English well and this reduces their confidence to speak English in front of them. The survey clearly shows that not only students’ perceived abilities impact their participation in HOQ, but the classroom setting in which HOQ takes place also matters.

CONCLUSION

The findings from this study was involved a set of 50 students in a classroom. The term ‘difficult’ or ‘challenging’ would yield difficult results pertaining to the cognitive levels of students in different setup. The generalization of this result is limited. HOQ takes place in a certain context and the perceptions, attitudes, and beliefs of the participants impact the products (Carlsen, 1991). Teacher gets a positive impact in the class when she simply changes the questions according to the meta-linguistic competence of the students. Teacher should make students participate in HOQ successfully by keeping a number of teaching factors in the classroom.

Teacher can have an ‘observing’ graph of her students by posing questions in small group, one-on-one or in pairs. After making students to gain confidence and language proficiency, teacher can pose HOQ to the students. Teacher should provide and improve all the four skills in students and by asking higher level questioning; she can improve the thinking skills of the students.

REFERENCES


