

# An Approach to Note Taking That Encourages Higher Order Thinking

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## Introduction

With the growing number of EMI courses at Japanese universities, students have more opportunities to take lecture courses in English. However, these courses should not be relegated to the status of advanced listening courses. If EMI courses are to live up to their potential, students should actively engage with the content that is presented. This presentation will show an approach to note taking that encourages students to utilize higher-order thinking skills with a particular emphasis on the Analyze and Create categories of the Cognitive Process dimension of Bloom's Revised Taxonomy (Anderson, Krathwohl, et al., 2001).

## Traditional Note Taking

Note taking in lecture courses has traditionally consisted of students writing down the information that lecturers say or display on a screen or board. In EFL courses, students often write this information down verbatim. This form of note taking focuses on the **Remember** category of the Cognitive Process dimension of Bloom's Revised Taxonomy (Anderson, Krathwohl, et al., 2001). In other words, students take notes in order to remember the content later for tests.

Also, with this form of note taking, there is often little or no feedback given to students during lectures. When feedback is given, it often comes in one of two forms. First, feedback may be given in the form of a quiz. Based on quiz scores, students get feedback on what they **remember** or not. In other cases, lecturers might ask students to explain concepts from the lecture in their own words and then give feedback on whether students **understand** the content or not.

## A Different Approach to Note Taking

**In order to encourage students to engage in higher order thinking when taking notes, ask them to write about the connection between lecture content and their experiences.**

When doing this, students select lecture content that is relevant to their experiences. Select is a verb that is associated with Differentiating in Bloom's Revised Taxonomy, which is an aspect of **Analyze** (Anderson, Krathwohl, et al., 2001). In addition to encouraging higher order thinking, the connection of lecture content to personal experience leads to deeper and more meaningful learning (hooks, 1994; Shaules, 2019).

This approach to note taking creates notes that are worth discussing in class, and this provides an expanded opportunity to provide meaningful feedback in lecture classes. Feedback, particularly when it is instructive rather than corrective, has a large positive effect on learning (Hattie & Timperley, 2007; Hattie, 2009). For example, feedback can come in the form of questions. A discussion partner may ask a question that leads one to view their experience through another lens based on a different concept from the lecture, a change in a variable, or an overlooked detail. This requires one to **analyze** the connection between the personal experience and the lecture content again.

## Course Context

**Course Titles:** English Lecture Ia / English Lecture Ib

**Students:** 3rd year English major students who have completed a study abroad program of either 6 months or 1 year

**Aim of the Course:** To provide students with challenging lecture courses conducted entirely in English in a style similar to what they might experience at a North American University

**Topics of the Courses:** Business Psychology (Motivation, Group Dynamics, Management Style, Conflict in the Workplace, etc.)

## Course Procedure

**Homework Reading:** 3 to 4 pages; quiz at the beginning of class

**Topic Preview:** students read a business email featuring the topic of the lesson; demonstrates how lecture content might be used

**Lecture:** 15 to 20 minute lecture; the lecture content is the same as the homework reading but it is expanded with examples and case studies that illustrate the concepts in the lecture; students take notes on lecture content that is relevant to their experiences

**Class Discussion:** two students are selected to share their ideas from their notes in a discussion with the teacher; the teacher models how to delve more deeply into the topic by asking follow-up questions; other students observe the discussion

**Pair Discussion:** students have some time to further develop their notes and then hold pair discussions on the topic of the lecture

**Reflective Writing:** students write a paragraph connecting their personal experiences with the lecture content

English Lecture Ib	Week 2	Theories of Motivation
<b>Preview</b>		
1. _____ 2. _____ 3. _____ 4. _____ 5. _____		
<b>Notes:</b>		
Which ideas from the lecture relate to your personal work experience?		
Which ideas from the lecture do you think will be useful for you in the future? Why?		
Week 2		

## How This Approach to Note Taking Encourages Higher Order Thinking

Since the lecture content is the same as the homework reading content, this reduces the cognitive load of listening to the lecture. Additionally, students are not required to write down all of the lecture content, which reduces the pressure that comes with that. This gives students the time to listen to the content and to select **(analyze)** the content that is relevant to their experiences. Students are also given a few minutes after the lecture to add to their notes.

The class discussion requires students to use their notes to talk about the connection between lecture content and their personal experiences. Feedback during the class discussion can not only focus on checking if students **understand** lecture concepts, but also on follow-up questions that can lead students to **analyze** other aspects of the lecture content that may apply to their situation or to elicit further details that may contribute further to the discussion. Also, the class discussion serves as a model of how to ask follow-up questions in order to promote further analysis of the concepts and experiences being discussed.

Note taking and all other class activities lead students to develop ideas that they can use in their reflective writing. By combining lecture content with their experiences in this activity, they **create** an original work.

## Challenges to Overcome

There are two challenges to overcome when implementing this type of note taking. The first is that students will not know what to write. This can be overcome by providing models for students. This can include models of completed notes or a live demonstration by the teacher of how to write notes with a recorded presentation. The benefit of a live demonstration is that teachers can think out loud to model the thinking process during note taking.

The second is that students who don't do the homework reading will have difficulty in participating in class. In this case, keep expectations high. If the class is made easier for these students, it will send the message that it is not necessary to prepare for class. Students who struggle in one class will tend to prepare better for the next class.

## Conclusions

Lecture courses can be used to promote higher order thinking. In particular, students can be encouraged to **Analyze** lecture content by taking notes on content that connects to their personal experiences. They can use these notes for discussion and can further **analyze** the content through feedback in the form of follow-up questions. Students can then use the ideas in their notes and from their discussions to **Create** a piece of reflective writing that synthesizes the lecture content with their personal experiences.

## References

- Anderson, L. W. (Ed.), & Krathwohl, D. R. (Ed.), Airasian, P. W., Cruikshank, K. A., Mayer, R. E., Pintrich, P. R., Raths, J., & Wittrock, M.C. (2001). *A Taxonomy for Learning, Teaching, and Assessing: A Revision of Bloom's Taxonomy of Educational Objectives*. New York, NY: Longman.
- hooks, b. (1994). *Teaching to Transgress: Education as the Practice of Freedom*. New York, NY: Routledge.
- Hattie, J. (2009). *Visible Learning: A Synthesis of over 800 Meta-analyses Relating to Achievement*. London, UK: Routledge.
- Hattie, J., & Timperley, H. (2007). The power of feedback. *Review of Educational Research* 77 (1), 81-112.
- Shaules, J. (2019). *Language, Culture, and the Embodied Mind: A Developmental Model of Linguacultural Learning*. Singapore: Springer.

For further questions or discussion, you can contact the presenter at: <hooper.todd.james@ilc.setsunan.ac.jp>

Bloom's Revised Taxonomy  
(Anderson, Krathwohl, et al., (2001)

Remember

Understand

Apply

Analyze

Evaluate

Create