Aligning Active Learning with Contemporary Goals for Education

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Abstract: In response to contemporary ideas on educational goals, this paper provides practical guidance on incorporating active learning in university level L2 English language classes. The first section looks at consciousness raising discussions designed to introduce students to learning to learn and knowledge/skill transfer strategies. The aim being to help them take a more holistic view of their studies, and recognize how they connect at an academic level, as well as later with the world of work. The second section proposes the use of realistic extension activities (REAs) at the post-production stage of lessons to provide students with more effective hands-on experience of making these connections, and applying what they have learned. Example activities are described and suggestions made for creating similar activities through careful manipulation of four key variables (time, people, medium, and communication).

Keywords: Active learning, Learning to learn, Realistic extension activities (REAs)

Background - Preparing our students for an uncertain future

If it were easy to teach effective L2 language classes, there would be a lot more polyglots among us. In reality, it would be fair to say that by the end of most courses, with the exception of a few exceptionally gifted and hardworking individuals, the students have made just incremental gains in their language proficiency. That even this modest result is possible is testament to the hard work and dedication of theorists and practitioners who have strived to understand and speed up the complex process of language acquisition. Current, in-service language teachers are in debt to those who have developed principles and methodologies towards this end, for though no one contribution has delivered the holy grail of an infallible method for language instruction, combined they provide a diverse toolkit from which practitioners can select the ways and means to assist their students. As language teachers, we are fortunate to find ourselves in a time when lesson planning is for many an autonomous process, freed from the constraints of a single overriding methodology du jour. We can fill our classes with bespoke activities that draw upon ideas from a wealth of sources to suit our particular aims. At the university level, it could be argued that teachers have an obligation to select and adapt pedagogic practices that will prepare students for their chosen role in society upon graduation. The university teacher's aim should therefore be to not only provide

students with the requisite knowledge of their chosen field, but also, to furnish them with the skills to function in professional society.

'Employers expect graduates to have technical and discipline competences from their degrees but require graduates also to demonstrate a range of broader skills and attributes that include team-working, communication, leadership, critical thinking, problem solving and managerial abilities.' ... 'It is arguable that specific definitions are less important than an agreed focus on approaches to promote such transferable skills and fostering attributes that will enable graduates to find appropriate employment, progress in their work and thus facilitate the success of their organisations and contribute to society and the economy.' Employers' perceptions of the employability skills of new graduates - University of Glasgow SCRE Centre and Edge Foundation 2011.

On top of this, we exist in an era of uncertainty, a time when the impact of technology, market forces, and political flux has produced new ways of working, communicating, and living. Changes that can seem out of kilter with the needs of people in search of an identity within the bounds of a coherent community. Society is becoming increasingly atomized, and the information and channels to navigate it legion. For this reason, students will likewise need the skills to respond effectively to diverse and fluid contexts, as well as the interpersonal assuredness to maintain relationships that are amicable, affirming, and lasting in this rootless age.

'Students will need to apply their knowledge in unknown and evolving circumstances. For this, they will need a broad range of skills, including cognitive and meta-cognitive skills (e.g. critical thinking, creative thinking, learning to learn and self-regulation); social and emotional skills (e.g. empathy, self-efficacy and collaboration); and practical and physical skills (e.g. using new information and communication technology devices).' The Future of Education and Skills - Education 2030, OECD 2018.

Hence, university courses should be taught in such a way that students gain knowledge of the society that they are soon to enter, and secondly, that learning reflects and is relevant to the kinds of tasks and interpersonal dynamics that exist therein. For these reasons, as well as drawing from other diverse sources of pedagogic knowledge, lesson planning ought to be informed by ideas on active learning; an interactive approach that foregrounds learning to learn and the application of knowledge in diverse contexts. With regard to the teacher's day-to-day decision-making during the lesson planning process, this requires that activities be designed to help students develop the learning skills and mindset needed to face and overcome the challenges they will encounter in professional life.

What is Active Learning?

Active learning is by no means a new concept, in general education, particularly the sciences, it was born many decades ago when learning moved out of the lecture hall and into the laboratory. It is defined by a shift from top-down transfer of theoretical knowledge, to a style of study where students learn through 'hands-on activities' (Beichner, R.J., 2014, p.12). The modern theory behind this can be traced to ideas on constructivism from Piaget, Vygotsky, Von Glaserfeld, and Mathews (Gail Jones & Brader-Araje, 2002), where the central themes of knowledge construction in the mind of the learner and learning through action/interaction are of most interest to the teacher. The suggestion is that knowledge cannot be directly communicated to the learner, but rather that he or she should 'actively engage in meaning-making' and that according to Piaget, 'knowing an object or event is to use it by assimilating it to an action scheme...' (Gail Jones & Brader-Araje, 2002, Defining Constructivism). This key element of the constructivist philosophy is succinctly captured by Chickering and Gamson (1987, p.4) when they state in support of active learning that, 'Learning is not a spectator sport.'

For educators, active learning can be seen as an antidote to problems linked to traditional, receptive forms of study, where top-down, teacher-fronted lessons result in a passive learning style with little room for analysis or application of taught knowledge/ skills. Critics of this approach believe that through it students can only acquire 'inert knowledge' (Lebow, 1993, p.9) or 'decontextualized skills' (Grabinger & Dunlap, 1995, p.7), which have limited value in the real world. Such knowledge is deemed to be nontransferable, and therefore, of limited practical value for learners. By contrast, through active learning, students are encouraged to think about how they are learning, to confront and correct misinterpretations, and (re)apply what has been learned in realistic tasks. In this way, students are said to engage in intentional or active learning. Most modern teachers would likely agree with such a philosophy, but would be unwilling to abandon the many effective elements of pedagogy that they currently use in order to adopt an entire methodology based on active learning. A carpenter would not swap all of the tools in his bag for the latest drill. Fortunately, active learning is often viewed more as an approach than a method (Prince, 2004). As educators, we must therefore look at ways to integrate activities to meet the aims of active learning into our regular lesson flow. To do so, a more concrete understanding of the defining principles of active learning is required. Barnes (1989) suggests that active learning should be:

- 1. **Purposive:** the relevance of the task to the students' concerns.
- 2. **Reflective:** students' reflection on the meaning of what is learned.
- 3. **Negotiated:** negotiation of goals and methods of learning between students and teachers
- 4. **Critical:** students appreciate different ways and means of learning the content.
- 5. **Complex:** students compare learning tasks with complexities existing in real life and making reflective analysis.

- 6. **Situation-driven:** the need of the situation is considered in order to establish learning tasks.
- 7. **Engaged:** real life tasks are reflected in the activities conducted for learning. (Barnes, 1989, p.19)

Looking at the points above, all seem to fall under the umbrella of learning-to-learn and knowledge/skill transfer. Further analysis suggests that from a pedagogic perspective, points 1 to 5 would be best addressed through discussion based activities, while points 6 and 7 would appear to necessitate more close planning on the part of the teacher. Accordingly, the remainder of this paper will be divided into two parts. The first focusing on consciousness raising activities designed to introduce students to learning-to-learn and knowledge/skill transfer strategies. The second, on the creation of realistic learning tasks.

1. Learning to Learn and Knowledge/Skill Transfer

Learning-to-learn means having students actively and consciously engage in the learning process. They must study with their minds open to different styles of knowledge uptake, analysis, and application, remaining aware at all times that it is as important to acquire an understanding of the process as it is the content of what is being taught. In fact, though it is probably best not to state this to students explicitly, in the long term the content is essentially secondary, as the process has much wider application. Furthermore, it means giving students agency in the development and selection of learning strategies, while reminding them as they do so to carefully consider the current and future merits/demerits of their choices. Essentially, the teacher must aim to provide a current, if not a course towards awareness regarding optimal patterns of behaviour for their learning to occur. Finally, it means encouraging students to remember that they are still learning, and should therefore remain open to the possibility that what they think they understand about a particularly concept could in fact be erroneous. Hence, maximizing possibilities for growth. All of this needs to be communicated to the students in digestible and actionable chunks, which is why discussion-based activities are suggested.

Closely associated with learning to learn is the concept of knowledge/skill transfer. To properly prepare our students for the challenges they will face on graduation, notions like cramming for credit or just doing enough to graduate should be replaced with opportunities to discuss meaningful learning and how they can benefit from it. Students ought to be talking about the relevance of what happens in a given class, making connections with previous studies, combining knowledge, and reflecting on improvement, or extrapolating to identify scenarios in which their current learning experience might facilitate future success. Talk that puts them front and centre of the process, and consequently, gives them the motivation to further hone their learning skills. They should not be allowed to fall into the familiar trap of feeling that learning is a purely academic activity, or that one branch of their studies bears no relation to the others. In

short, their critical thinking skills must be engaged and advanced to make learning effective and transferable.

As previously mentioned, it is not necessary for teachers to radically change their lesson plans in order to integrate a focus on active learning of this kind. All of the discussion aims that have been outlined to deal with learning to learn and transfer can frame or punctuate an existing classroom activity, such as a vocabulary learning exercise, close scrutiny of a text or audio-visual content, a discussion, or a presentation. For instance, if a teacher is set to teach a lesson incorporating preparation for an upcoming presentation, this activity could be framed with teacher instigated student-to-student discussions. The first would likely focus on their experiences of planning activities of a similar nature, while the post-activity discussion would be a chance to reflect on any differences between the earlier experience and the task just completed. This, along with other examples, will be introduced below. Each discussion type is given a label and an appropriate time of use in relation to the existing activity. A short description of the discussion or example questions for students are listed. In addition, the relevant principles of active learning (see Barnes above) are noted in brackets.

Consciousness-raising Q&A 1: Learning to learn & skill transfer - Pre-activity (Purposive-Negotiated)

> What is the aim of this task? How should we approach this task? What is the best strategy for completing this task? What have you done in other classes that could help us to complete this task?

Consciousness-raising Q&A 2: Learning to learn & skill transfer - Post-activity (Critical-Negotiated)

> What helped us to succeed? What slowed us down? How could we have been more effective? Which group's approach was the most effective? Why?

Pause Procedure: Learning to learn & knowledge transfer - In-activity (Reflective)

>Students pause for 2-3 minutes at pre-determined intervals during the task in order to confirm understanding of ideas, vocabulary encountered, or the direction of the task. (Adapted from Prince, 2004)

Integration Q&A: Learning to learn & knowledge/skill transfer – Post-activity (Reflective)

>What did you learn today? How does this connect to what you knew/believed before?

Comprehensiveness Q&A: Knowledge/skill transfer - Post-activity (Complex – Reflective)

>What did you learn today? In what future situations might this knowledge/skill be needed? How might this new knowledge/skill impact on your future study/work?

If students are encouraged to frequently have discussions of this kind, then as well as learning to learn and raising their awareness of transferable skills, many of the goals listed in the quotations found at the start of this paper will also be worked towards. For example, all of the discussions are inescapably collaborative. What is more, instigating the pre-activity example will more likely result in greater cooperation during the actual task. Most teachers, especially those working at a Japanese university, will have seen "group" work start and end in silence. Through collaboration, they also help the students to develop their social and emotional skills, particularly when publicly confronting and talking about differences of opinion, failures and misunderstandings. Likewise, in witnessing others admit their struggles, classmates must learn to vocalize feelings of empathy to show support. Finally, when considering how to overcome these problems and find better, more effective ways to process and use knowledge, they will be strengthening their ability to solve problems and exercising creative thinking.

Evidently, their are a lot of advantages for students in having these kinds of talks. What should also be noted is how they can benefit teacher-student communication and rapport. For one thing, simply by setting up and monitoring these discussions, the students are made aware that the teacher is invested in their learning, too. The format communicates that teachers recognise students' individual study styles and are interested in promoting growth. Moreover, although the discussions put emphasis on student autonomy, the teacher should still make use of interventions for supportive or corrective guidance. These are essential for trust to develop between learners and teachers, the latter remaining the most knowledgeable and experienced individuals in the classroom. Corrective feedback or praise offered in this way is less overbearing than setting limits with a fixed list of instructions prior to activities, as is often the case with more traditional styles of education. One final and very important point is that using such discussions usually increases the range of feedback that teachers can offer. For instance, the discussions lay the groundwork for more far-reaching advice about learning and its application in other areas, the value of group or individual work depending on the context of the task, as well as the role of personality in learning. As for the standard issue of error correction, use of the pause procedure is particularly helpful in the Japanese context as it allows for the elicitation of a greater number of questions from students to the teacher. Unfortunately, due to face issues and general shyness, many Japanese students are still apt to sit in silence when they encounter something that they do not understand. In such instances the pause procedure is a useful valve for built up frustrations. It gives students a secure environment to raise their concerns with a classmate, and more often than not, the conclusion is that neither of them fully understands the problematic word or concept. Emboldened, they will then ask the teacher. Pairs work best for pause discussions, as groups, even of peers, can still be intimidating and lead to face issues. For learners with lower levels of English ability, these, like all the discussions, can be held in Japanese. After all, the primary focus is on learning to learn rather than learning the foreign language in these stages of the class.

2. Realistic Extension Activities (REAs)

Having looked at the value of discussions in operationalizing the first five of Barnes' principles of active learning, the focus will now turn to the last two; making tasks situation driven and engaged. First of all, as mentioned earlier, there are certain constraints when it comes to activity planning (e.g. time, appropriacy, complexity) that mean teachers should take most of the lead in this area. Furthermore, Barnes describes situation-driven tasks as those where the needs of the situation are considered. Therefore, whoever decides on the nature of the tasks must isolate those which not only fit this description, but also guarantee the need for application of taught language and content. Leaving selections like this up to the students may well result in activities that are too much of a departure from what has previously happened in class. Finally, if the tasks are to be engaged, that is, realistic examples of activities from the world of work, then surely the teacher, someone familiar with the demands of professional life, is in a better place to make such judgements.

Faced with the question of what kinds of productive tasks to include in our classes, teachers tend to fall back on a familiar list, with discussions and presentations the mainstay. To a certain extent, the solutions offered here are no different. However, what is proposed is a re-examination of these formats. For though some would argue that activities like regular in-class discussions and presentations can be seen as forms of active learning in themselves, they are still nevertheless demonstrations of declarative knowledge in that they show that knowledge has been acquired, but not necessarily that it can be applied. They are the production events that confirm knowledge uptake. As teachers, if we are to get closer to addressing the previously stated educational goals, something more is required when it comes to truly showing our students the value and full range of transferability of their learning. Consider a presentation given in a business, this would rarely be seen as the final act in a process, as it almost always is in an academic context. Instead, it is the moment when an individual shows to others that they are in possession of the facts or know-how to be used for a greater aim. From this point, they will then be required to prove that they can help others to profit from this knowledge, they will be asked to share it in different contexts and through alternative mediums, and tasked with solving problems related to the content area. These are the realistic extensions of primary knowledge acquisition, and consequently, to properly prepare our students for the workplace, we should be mirroring such events by introducing them to realistic extension activities (REAs) after completing the traditional production phases of their classes.

As an initial example, and for further clarification on the nature of these tasks, consider the following REA (Table 1) that was used in an English L2 content class at a Japanese university. This hand out was given to students after a unit of study on social issues, focusing on the problem of bullying. Prior to commencing this activity, the students (a group of 20 learners with an intermediate level of English ability) had already completed

input activities. These consisted of two reading comprehension activities using teacher-sourced authentic English materials (a requirement of the course). The first was a newspaper article outlining modern forms of bullying and the scale of the problem in society. The second was a list of tips to prevent and respond to instances of bullying, written by a reputable organization for use by victims, teachers, and other students who witness bullying in schools. After the input, students' knowledge of the issue was evaluated by means of a vocabulary test. Finally, after preparatory discussions in pairs, structured group discussions on the issue were implemented as production activities. The REA, therefore, was developed to see if students could apply the knowledge they had gained to a more dynamic, and realistic scenario.

Some points to note about the hand out are that in this particular case it was designed with collaboration in mind. The class was divided into five groups of four students and six possible tasks were presented. This allowed for a degree of autonomy, and hence negotiation within groups about task selection. In addition, the groups were required to work together closely on their selected task due to the inclusion of certain rules regarding the presentation stage of the activity. On a more general note, as with all REAs, stakeholders in the issue were included in the tasks (teachers, students, and parents) to familiarize students with applying knowledge using different registers. Likewise, different mediums were included to build their awareness of the need to transfer knowledge to various genres of expression.

Table 1: Example REA hand out

Social Issues 2: Bullying (Analyse>Apply Knowledge>Produce>Present)

Read the following:

Case Study

You are members of the teaching staff at a school (choose: elementary, junior-high, high school). There is a problem with bullying at your school. Teachers have witnessed pack and individual bullying in classrooms, the schoolyard, hallways, and in the gymnasium. In addition, they have heard some students talking about instances of cyber bullying. Within the past year, four different parents have contacted the school to share their concerns about bullying. The school has no fixed policy on how to deal with bullying. For this reason, teachers are unsure about what to do when they see or hear about instances of bullying.

Activity:

- 1. Choose one task from below to work on in your group. 2. Complete the task.
- 3. Present your group's work to the class.

Note: Groups will present in turns. For example, first, each member of group A will go to a different area of the class and present to other class members. Next, group B will present. For this reason, everyone in the group must have an identical copy of the group's work. Also, you must be ready to explain the decisions that were made while working on the task.

Possible Tasks

- a. Write a list of advice for kids who are being bullied (minimum five items)
- b. Write a list of advice for teachers on how to prevent bullying (minimum five items)
- c. Write a list of advice for teachers on how to deal with bullying after it occurs (minimum five items)
- d. Make an information poster to help prevent bullying in your school
- e. Make an information poster to prevent cyber bullying amongst students
- f. Write a letter to all parents describing your new policy to prevent bullying

Formulating Ideas for REAs

Hopefully, the previous example shows that in designing REAs, the needs and meaningful elements of the chosen scenario depend on the variables contained. Some of these will remain very context or industry specific and therefore unknown to the outsider. Nevertheless, there are those that can be viewed as constant. The key variables in this category that come immediately to mind are time, people, medium, and communication. Considering and manipulating these common variables can be a useful way to develop REAs. Ultimately, what the teacher should aim for is a realistic task that is also practical for the classroom environment. A task that does not contain elements which require students to have skills/knowledge that have not been covered in the course, or that one could not reasonably expect them to possess to complete the task. Table 2 provides a flowchart for teacher decision making when planning REAs that attempts to meet these aims.

Table 2: REA Planning Variables

REA Planning through Manipulation of Variables

1. select the scenario



2. explore the variables and consider approaches

Variable 1: Time - Consider..

What is a realistic time frame for preparation?

Does the scenario involve high or low time pressure?

Is the scenario a single event or is it repeated?

Variable 2: People - Consider..

Who are the relevant stakeholders in the scenario?

What is the relationship between the student's role and the stakeholder?

Is this relationship a realistic example of one in which application of the learning would occur?

Variable 3: Medium - Consider..

What is the medium for message transfer?

Are the students familiar with use of the medium?

Is this medium suitable for application of learning?

Is this medium practical for transfer of skills?

Variable 4: Communication – Consider...

What register is appropriate when communicating with the chosen stakeholder?

What other language usage considerations apply when communicating with the chosen stakeholder(s)?

What degree of teacher intervention on register/language usage will be necessary for task completion?

3. anticipate results

4. realise or review

Once again taking the example of the business presentation, using the flowchart might lead to the following three possible scenarios. Remember, these scenarios are extensions of the initial productive act (giving the presentation), so students will be approaching them having completed such a task and are now going to apply their knowledge to a connected event. Each of the scenarios has been broken down with notes to show how the variables apply:

Scenario 1: A co-worker who could not attend your presentation asks for a casual verbal summary of the main points.

Scenario 2: Your manager asks you to write a brief (5 question) survey to learn about staff opinions on the topic of your presentation. She wants this done before the end of the day.

Scenario 3: You are applying for a job and want to write a description of your presentation as evidence of relevant experience for the position. The deadline for applications is next week.

Time:

Scenario 1 (verbal summary): No preparation time. Little time pressure. Possibility of repetition if another co-worker asks for a summary.

Scenario 2 (short survey): Limited preparation time. Significant time pressure. Negligible possibility of repetition.

Scenario 3 (written description): Reasonable preparation time. Slight time pressure from deadline. Reasonable possibility of repetition.

People:

Scenario 1 (verbal summary): Two co-workers at a company. One student plays the role of presenter, the other of the colleague asking for a summary. Realistic scenario.

Scenario 2 (short survey): Workers at a company. One student plays the role of the presenter, no manager role required. Challenging, but realistic scenario.

Scenario 3 (written description): Job applicant and HR staff at prospective employer. One student plays the role of the presenter, no HR staff role required. Realistic scenario.

Medium:

Scenario 1 (verbal summary): Face to face verbal communication. The medium corresponds to that of the earlier productive act (presentation), so appears suitable for application of learning and optimum for transfer of skills.

Scenario 2 (short survey): Written communication requiring use of word processing software. The medium should be familiar to undergraduate students and appears suitable for application of learning, as well as for transfer of skills.

Scenario 3 (written description): Written communication requiring use of word processing software. The medium should be familiar to undergraduate students and appears suitable for application of learning, as well as for transfer of skills.

Communication:

Scenario 1 (verbal summary): Register is casual and should pose no problems for students. Limited rules of language usage apply, but talk must be civil and meaningful. Teacher may need to prepare some questions for the student playing the role of the listener, otherwise, low degree of teacher intervention likely.

Scenario 2 (short survey): Register is formal. Care needs to be taken with survey questions, which should be clear and neutral. High degree of teacher intervention likely. Scenario 3 (written description): Register is formal. Various considerations exist in terms of language usage. Moderate degree of teacher intervention likely.

Conclusion

In this short paper it was suggested that consciousness raising discussions can be used to introduce students to learning to learn and knowledge/skill transfer strategies within the framework of their existing lessons. These discussions can be a way to keep students focused on the wider goals and applications of their learning, and to make them feel that university studies have relevance to their future activities. Hopefully, they will go on to be able to explain the connections between what they learned in the classroom and the emerging challenges that they face in the working environment. Furthermore, the experience of navigating the learning process with their peers will give them the emotional skills, flexibility, and resilience to overcome these challenges, making them valued colleagues, employees, or employers.

It was then argued that current in-class production activities, though often examples of active learning, are not sufficient when it comes to preparing our students for the complexities of working life; that they do not replicate the kinds of challenges alluded to above. As a result, a further, more realistic stage of production was proposed. Planning such activities is time-consuming for the teacher, furthermore, designing the right tools for evaluation that take in the collaborative nature of some of the tasks and the shared responsibility for learning is also a burden. However, the results are worthy of this extra application on our part. Casual observation suggests that students respond well to the

freshness of such tasks, enjoying the creative and competitive elements contained. What is more, they seem to welcome the autonomy that both the discussions and REAs provide, and the opportunities to learn from each other. It is hoped that further use and analysis of these two approaches, including formal feedback from students themselves, will provide confirmation of these merits.

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