

# The Use of Videos as a Cognitive Stimulator and Instructional Tool in Tertiary ESL Classroom

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#### **ABSTRACT**

Even though technology is known to have a transformative effect on teaching and learning, videos are not widely used as an instructional tool in the classrooms in Malaysia. This paper focuses on using videos a cognitive stimulator and an instructional tool especially in tertiary ESL classrooms. This paper the potential of using videos for retention of subject content, stimulation of the cognitive aspects of language learning and to contextualize learning. Furthermore, the constraints of using videos an instructional tool in ESL (English as Second Language) classrooms are identified. In the first phase, the Fuzzy Delphi Technique was employed to obtain consensus among 16 experts on the potential of using videos. In the second phase, an exploratory implementation study was conducted with 15 first-year student volunteers in an English Language proficiency course at an institute of higher learning in the Klang Valley. Students' work and responses were gathered after conducting an ESL lesson using video, and these data formed the basis for analysis and discussion in this paper. It is observed that students enjoy lessons using videos and produced better quality written tasks when videos were employed for English instruction. Findings of this study show that ESL learners could benefit from using video as an instructional tool.

**Keywords**: videos, ESL, instructional tool, cognitive-stimulator

## INTRODUCTION

Instructional materials are no longer limited to static text as with the advent of multimedia technology, presentation are being transformed from text-based to multimedia to capture learner attention and interest. Herron and Hanley (1992) asserted that the use of video facilitates English as a Second Language (ESL) comprehension and retention by rendering the information more meaningful to students. In addition, previous research have shown that the use of videos can enhance the teaching of vocabulary or a second language (Silverman & Hines, 2009, Verhallen & Bus, 2009; Verhallen, Bus & De Jong, 2006). However, the lack of online digital video in schools could be a significant barrier in preventing teachers from using technology as part of the assessment or teaching process in ESL teaching in classroom (O'Loughlin, Chroinin, & Grady, 2013). Even though studies have revealed the transformative effect that technology can have on teaching and learning, research have shown that innovative and transformative uses of technology in classrooms is still not the norm (Bruce & Hogan, 1998). At the end of the day, out of frustration and lack of experience of using technology instructional tools, teachers frequently portray technology as "mechanistic, exterior, and concrete devices that accomplish tasks and create products" rather than tools that can be used for transformative and innovative teaching practice (Bruce & Hogan, 1998).

There have been various debates on how language acquisition can be achieved in an ESL classroom. Based on various Second Language Acquisition (SLA) research, it is argued that multimedia applications especially videos will be able to provide meaningful tools in ESL classroom. Studies have indicated that technology can transform schools, classrooms, and instruction and can promote environments in classrooms where students are actively engaged in learning through collaborative participation (Beach & Lundell, 1998).



It is also fundamental to note that many language textbooks and other learning materials are organised around grammar principles, teaching them in order of perceived usefulness or frequency. However, research in Second Language acquisition over the past three decades has shown that focusing instruction on learning grammatical forms does not lead to fluency in real language use (Doughty & Long, 2003). Learners remember better when they see, hear and do. The level of a students' understanding of a subject when they see, hear and produce materials during instruction is higher (75%) compared to students who only see during instruction (20%), and see and hear only (40%) (Lindstorm, 1994). Thus, learning with multimedia elements such as videos seem to be effective for learning activities (Zahn, Pea, Hessse & Rosen, 2010).

Media, in the form of audio-visual (AV) aids, has been used in Malaysia to assist teacher in delivering effective lessons since 1950s (Shamsuddin Hassan, 2012). This purpose of conducting this study is to determine if using videos in ESL classrooms helps students to retain the subject content learnt. Besides, researches attempt to investigate if the use of videos in ESL classrooms helps to contextualize learning. In addition to that, this study assesses whether the use of videos in ESL classrooms helps to stimulate the cognitive aspects of learning. Also, the discussion in this paper will be highlighting the constraints of using videos as teaching and learning tool in ESL classrooms.

# **Research Objective**

The objective of this study is to obtain consensus among experts on the use of videos as a cognitive stimulator and instructional tool in tertiary ESL classroom. The research questions are as follows:

- 1. To what extent does using videos in ESL classrooms help students in retaining the subject content learnt?
- 2. Does the use of videos in ESL classrooms help to contextualize learning?
- 3. Does the use of videos help to stimulate the cognitive aspect of learning in ESL classrooms?
- 4. What are the constraints of using videos as a teaching and learning tool in the ESL classrooms?

#### LITERATURE REVIEW

Roblyer and Doering (2010), mentions that the recent trends in technology has allowed a wider variety of tools and applications that can be used for teaching and learning. These tools refer to social media (which includes means for social interactions), interactive tools and content development tools. Today, IT (Information Technology) can be formidable as a tool to promote quality and efficiency of education. Increasingly, development tools based on these technologies which adapt quickly with abundant human needs, has led to a new form of interactive and creative learning environment, active and inclusive occurs (Ghasemi, Hashemi & Bardine, 2011).

With the vast development of technology and advancement of media, in the form of audio-visual especially; has created a great impact for the teaching and learning in classroom. The advancement of technology has also transformed the type of media being produced and its delivery method (Norlidah Alias, Dewitt & Saedah Siraj, 2013). As more microcomputers are used in schools and a variety of applications for learning are developed, media has shifted from the analog form to digital form (Roblyer & Doering, 2010). This has resulted in the development of a wider range of teaching and learning materials which are in the form of videos that can be accessed from CD-ROM or through online internet access. With the availability of repository for information and interaction as a platform for storing digital information and content, a collection of materials in the digital form - text document, videos and photos - is stored and, tagged and retrieved (Norlidah Alias, Dewitt & Saedah Siraj, 2013). Thus, making it easier for many more materials, information and content to be used for teaching purposes such as downloading relevant content from the social media into video format for the language learning classrooms.

# The Use of Video in Teaching and Learning

Indeed, majority of the instructors and learners recognised that among the most commonly used educational technology in most of the classrooms is the video. Video is seen to have brought stories and meanings alive through sound, action and visuals. Therefore they offered more multifaceted nonverbal support than books (Kamil, Intrator & Kim, 2000). Recent research suggests that the use of videos might be another context ripe for those who are learning English as a second language (ESL) or as a language other than what they speak at home (Silverman & Hines, 2009). Using videos in the classroom is motivating and fun as video introduce various aspects of real life into the second or foreign language learning environment and help to contextualisation the learning process (Sherman, 2003). Videos can be used in many different instructional settings, from classroom to online campuses. The great value of videos lies in their combination of sound, images, and sometimes, text (in the form of subtitles), together with social-cultural information about habits, traditions, cultures, and others (Chen, 2011). All these make videos a very valuable tool for teaching languages and cultures.



#### The Use of Video in ESL Classroom

Teaching English as a second language or a foreign language in schools, colleges or universities aims to achieve comprehension and application of English language skills. It is imperative that learners of a second language or a foreign language are able to understand and receive knowledge of the language such as the grammar or vocabulary and sentence structure (Yang, Chen & Jeng, 2009). Viewing videos, with its many audio and visual affordances is believed to be able to support learners of second language in developing more conceptualization of words and concepts (Silverman, 2013) than plain verbal instruction as information and meaning of words which are presented in audio and visual form will support learners of second language better.

#### The Use of Video for Retention of Content

Herron and Hanley (1992) asserted that the use of video facilitates foreign language or the learning of a second language in the aspects of comprehension and retention of content by rendering the information more meaningful to learners. Johnston and Milne (1995) also stated that the use of video in language classrooms enhances the learning by tuning the students' eyes and ears to the diversity of the language, as well as non-verbal cues, generally associated with the authentic speech in the audio-visual form while Secules, Herron & Tomasello (1992) posited that the use of video in the foreign language classroom greatly improves the learners' overall listening comprehension.

# The Use of Video for Authenticity of Learning

According to Svensson and Borgarskola (1985), video is an excellent tool to provide cultural insights for learners who have never visited countries where the target language is spoken or learnt. The use of video in this respect would help to promote contextualisation of a foreign culture or authenticity of appreciation for the culture. Furthermore, video effectively shifts the teaching methodology from memorisation to more flexible strategies for acquisition, organisation, retention, and application of the learning of a foreign language (Ambard & Ambard, 2012). This is rather relevant for learners of English language as their second language. Indeed, Shrum and Gilsan (2005) have further reiterated on this concept by explaining that video, whether obtained from the Web or other sources, is a useful tool to introduce authentic sociolinguistic elements into the classroom, alleviating the need to travel abroad.

#### The Use of Video for Contextualisation of Culture

Video in language instruction also presents real-life cultural situations, thus creating meaningful classroom environments (Ambard & Ambard, 2012). This is equally important in the teaching and learning of a second language because both the content and presentation of information may be unfamiliar to the learners. Learners of second language such as English language would normally required more support to comprehension and remember the content (such as meaning of vocabulary and language structure) taught. According to the finding of a study conducted by Herron, Corrie, Cole and Dubrell (1999), it was found that many of the first year students' knowledge of cultural information significantly improved from watching narrative videos. In fact, Manning (1988) suggested that video instruction in language should be aided by class discussion focused on the learners' background information regarding the video's topic with an emphasis on key words, cognates, and visual cues. Svensson and Borgarskola (1985) agreed that in order for video to achieve its effectiveness as a means of language instruction, it should be facilitated by a discussion guided by the instructor on what is a shown, thus helping learner to focus on the key details or events concerned. The language lessons aided by the use of video provide a better appreciated of the abstract aspect of a language in a more effective way.

#### The Use of Videos as a Stimulator

In another study conducted by Harlow and Muyskens (1994), it was reported that students have identified film and video as among the most effective classroom and out-of-classroom activities for language learning while Huberman and Medish (1975) also reported that students have high enthusiasm for the value of video materials to create realistic situations while depicting native speakers in actions. Thus far, research has validated the inherent benefits and widespread use of video as an instructional tool in foreign language classroom (Ambrad, & Ambrad, 2012).

When teaching learners a foreign language or second language, the teachers or the instructors should focus on how to facilitate learners' interest and motivation in learning the language. Learners hold their attention on language learning only if the learning is interesting; therefore in essence, English learning activities should be designed in such a way that it can arouse learners' interests (McGlothlin, 1997). In this case, the video aided lesson serves the purpose to arouse students' interest in learning a foreign language by enhancing their comprehension of the language while watching these authentic materials as suggested by Chen (2011). Previous studies have identified that while interest and confidence increasingly built in children, more positive impacts were on their language learning (Cohen, 1998).



Many studies have demonstrated a significant correlation between learners' motivation and achievement in English learning (Littlewood, 2001). For this purpose, video will be able to serve as the tool to motivate and stimulate learners' interest and thereafter better retaining the content of learning.

# 2.7 The Challenges of Using Video in Classroom

Although video is one of the most popular form of educational media across the curriculum and plays an increasing important role in classroom language learning; however, effective video usage in the classroom does not proceed without challenges (Zahn, Krauskopf & Hesse, 2012). Research has shown that if videos are shown or presented in a whole-class setting and are watched passively by the learners, they tend not to encourage the same level of reflective-learning activities as printed text (Saloman, 1984). Consequently, to be effective for learning, video usage in class must extend beyond classic teacher-centred presentation approaches (Zahn, Krauskopf & Hesse, 2012). It should foster student activities instead such as having creative learning in task contexts that incorporate collaborative knowledge construction in small groups (Goldman, 2004).

## 2.8. Gagne's Nine Events of Instruction

For the purpose of this paper, the instructional design for a lesson using video for the ESL classroom is based on Gagne's Theory. Gagne (1985) proposed nine events of instruction that should be included in the design of any instructional unit and which are associated with representative cognitive aspects of learning.

Table 1 Events of Instruction and Their Relation to Process of Learning

#### Events of Instruction and Their Relation to Processes of Learning

Instructional Event	Relation to Learning Process
1. Gaining attention	Reception of patterns of neural impulses
2. Informing the learner of the objective	Activating a process of executive control
3. Stimulating recall of prerequisite learning	Retrieval of prior learning to working memory
4. Presenting the stimulus material	Emphasizing features for selective perception
5. Providing learning guidance	Semantic encoding; cues for retrieval
6. Eliciting the performance	Activating response organization
7. Providing feedback about performance correctness	Establishing reinforcement
8. Assessing the performance	Activating retrieval; making reinforcement possible
9. Enhancing retention and transfer	Providing cues and strategies for retrieval

#### **METHODOLOGY**

# **Design of the Study**

The design of this study employs the Fuzzy Delphi technique which was introduced by Murray, Pipino and Gigch (1985). This is not exactly a new technique but is an instrument that has made enhancements to the Delphi method. Delphi is a way to achieve consensus using experts opinion (Kalivoda & Simpson, 1992). Fuzzy Delphi uses a combination of interview and survey to collect data among experts in a certain field.

The traditional Delphi method has its disadvantages which include low consistency of expert opinions, implementing cost is high, and modification of experts' individual opinions in order to reach consistent overall opinions.

There are also other weaknesses as mentioned by Saedah Siraj (2008) the failure of a researcher to choose the



real experts will lead to the questionable validity as well as boredom among the experts because of the recurring rounds of feedback. Another weakness is that a small number of experts are interviewed to assess or to measure something big.

Thus, Fuzzy Delphi Method has been developed to overcome the weaknesses mentioned above. The fuzzy Delphi method has been widely used in different fields. This is due to its following advantages:

- 1. Saves time to conduct questionnaire
- 2. Saves costs
- 3. Reduce number of surveys required
- 4. Obtain more reasonable and proper responses from experts

Firstly, interviews were conducted with five experts from the ESL field. These experts were chosen based on the credibility, their expertise as well as their experience in the field. An interview protocol was prepared based on the issues identified based on the gap to be filled in the area of the study. Interviews are invaluable in capturing the perception and understanding the meaning constructed by the expert (DeWitt, Norlidah Alias, Saedah Siraj, Yaakub, Ayob & Ishak, 2013). Interviews are essential to get the opinions of the experts and further suggestions on the topic. The data from the interview was then used to develop a questionnaire which would be used for the Fuzzy Delphi method of data collection among experts.

The findings through the interview were analyzed thematically and three themes were derived from the data using the Fuzzy Delphi technique. Based on the responses from the four experts who were interviewed, the survey questionnaire was set.

# Sample of the Study

The sample for the interview comprises of five experts from the ESL field: 1 from Curriculum Development Centre (CDC) Malaysia, 1 expert in the education field, and 3 lecturers from tertiary institutions. The samples for this phase were chosen based on the expertise in the language field and their experience in the field, which should be exceeding 5 years of experience. As for the questionnaire, there were altogether 15 experts who were chosen based on their field of English language and experience of teaching in tertiary institutions.

## **Instruments**

The instruments for this study consists of an interview protocol which was prepared based on the issues derived from the study of the literature of the topic, a list of structured interview questions, and a questionnaire - 'The Use of Videos as a Cognitive Stimulator and Instructional Tool in Tertiary ESL classrooms', which was developed using the Fuzzy Delphi method. There were altogether 21 questions in the questionnaire that was developed from the analysis of the transcripts of interview with the experts. The three themes that were derived from the analysis were the advantages of using videos in ESL teaching (10 questions), effectiveness of videos in learning of ESL (5 questions) and the limitations of using videos in the ESL classroom (6 questions).

# **Data Collection and Analysis Procedure**

In the first phase, four purposively selected experts were interviewed to delineate their opinions and views on the use of videos as a cognitive stimulator and instructional tool in ESL classrooms. The interviews with the experts were audio recorded during the interview and the transcripts were analysed to derive the themes for the development of the questionnaire

The questionnaire, on the other hand, consists of 21 questions (refer to appendix 2) and a 5-point Likert scale was used: 1 - Extremely disagree, 2 - Disagree, 3 - Neutral, 4 - Agree, and 5 - Extremely agree.

	Extremely Disagree	Disagree	Neutral	Agree	Extremely Agree
Likert Scale	1	2	3	4	5
Fuzzy Scale	(0.0, 0.1, 0.2)	(0.1, 0.2, 0.4)	(0.2, 0.4, 0.6)	(0.4, 0.6, 0.8)	(0.6, 0.8, 1.0)

There are two main elements in the triangular Fuzzy Delphi method which are triangular fuzzy number and defuzzification process. For the triangular fuzzy number, each number in the Likert scale is represented in the form (m1, m2 m3), m1 as the smallest value, m2 the most plausible value and m3 being the maximum value as shown in the table above. The defuzzification process is conducted to convert the triangular fuzzy numbers into an exact value so that the



variables can be arranged and ranked. The formula used in the defuzzification process is  $A_{max} = \frac{1}{3}* (a_1 + a_m + a_2)$ .

Table 2 Evaluation questionnaires after FDM screening

Main areas	Ctatamant	Score			Domking	Group
Main areas	Statement -	Min	Max	De-fuzzy	Ranking	Ranking
The advantages of using video in ESL classroom (A)	A1	4	5	.71	4	2
	A2	3	5	.59	10	
	A3	3	5	.69	5	
	A4	4	5	.72	3	
	<b>A</b> 5	2	5	.60	9	
	A6	2	5	.60	9	
	A7	4	5	.69	5	
	A8	2	5	.60	9	
	A9	2	5	.63	7	
	A10	2	5	.64	6	
	B1	3	5	.60	9	
The effectiveness	B2	3	5	.64	6	
of using video in ESL classroom (B)	В3	3	5	.62	8	3
	B4	3	5	.62	8	
	B5	3	5	.62	8	
The limitations of using videos in classroom (C)	C1	3	5	.64	6	1
	C2	3	5	.73	2	
	C3	3	5	.68	6	
	C4	4	5	.73	2	
	C5	2	5	.55	11	
	C6	3	5	.76	1	

Based on the outcome as in Table 2, overall, question from area C which discuss the limitation of using videos in ESL classroom were ranked at number 1. In order to study this area, an interview was conducted with the teachers and students to support the statements.

While, area A which focus on the advantages of using videos in ESL classroom were ranked at number 2 and are B the effectiveness of videos in ESL classroom were ranked at number 3. For these areas, lesson plan were designed based on Gagne's Nine Event of Instruction and carried out. The outcomes will be analysed to examine the objective of this study.

## **Evaluation Phase**

Based on the ranking of the themes derived through the defuzzification process, an exploratory implementation was done with 15 first-year college students doing a certificate in English Language Proficiency course. A lesson plan for Integrated Language Skills (ILS) with 3 learning objectives was prepared by the lecturer prior to the lesson. Students prewriting and post-writing were gathered after conducting an English lesson on gadgets with the aid of video as the technology tool. After assessing their written work, 3 samples were purposively selected to be interviewed in a focus group setting. An interview protocol was prepared prior to the interview and their responses were audio-recorded. The transcripts were analysed to support the findings derived from the Fuzzy Delphi method.

#### **FINDINGS AND DISCUSSION**

## Using videos in ESL classrooms help students in retaining the subject content learnt

From the lesson conducted, it showed that almost all the students performed better in the writing task conducted after the video presentation of gadgets. Their writing portray that they were able to use the words that they heard in the video. Thus, this shows that they are able to retain the content better when exposed to audio-video learning materials. This supported the finding based on the questionnaires (A1 with ranking number 4) where students and teachers believe by using video it will be able to stimuli students thinking and make the teaching and learning effective.

# Use of videos in ESL classrooms help to contextualize learning

One of the common assumption in our educational system is that learning can be decontextualised - as though the whole is not needed to understand the part. As stated in this paper earlier, students are taught the reading, writing,



speaking and listening skills isolated. However, it is fundamental to point out here that in one single lesson using videos, three skills were emphasized. Students get to model the authentic English spoken in the video documentary, listen to the explanation and put them into writing. Hence, unintentionally, while the lesson focuses on the writing skill specifically, students are also able to enhance their aural-oral skills. Therefore, by using videos as an instructional tool in ESL classroom, students are able to spontaneously assemble the little pieces of knowledge into a coherent whole the conceptualism of learning. Based on the questionnaires distributed, the matter was ranked at number 6 (A 10 and B 2) where it looked into the effectiveness of video in helping students to contextualize matter of learning better.

## Use of videos help to stimulate the cognitive aspect of learning in ESL classrooms

Analysis of the data also revealed that video is an effective instructional tool to address learner difficulties in comprehending literary texts or articles. The use of narration, animation and sound helps to describe the content better. Most of the time, students are unable to think critically and creatively just by reading the description in books. The content, be it a situation or a phenomenon is said to be better understood with the aid of an audio-visual too, namely videos. The learners' low level of language proficiency would have been an obstacle for them to appreciate an article on the advent of gadgets through reading alone but the use of multimedia during the lesson has enabled them to access the text through a different medium.

## Constraints of using videos as a teaching and learning tool in the ESL classrooms

This area was not being able to be tested in the lesson plan as it discusses more on availability of facilities to implement lesson plan using video in classroom (refer to questionnaire C 6) which was ranked at number 1. Teachers' planning using video in classroom too was another high ranked issue at number 2, where teachers are required to prepare thoroughly a good lesson plan applying video in classroom. It is vital for teacher to choose the right video to be used in classroom as well.

The interview with the ESL experts also delineated that most lecturers refrain from using videos as an instructional tool in ESL classrooms due to the limited facilities. Most of the time, they find it almost impossible to have a classroom environment which supports the use of video. They face technical difficulties such as faulty LCD projector, unclear speakers and fuzzy screen. Some of them feel that when they use videos, the sound is disturbing to the class next door. Thus, they only use videos as an instructional tool when they really need to by making advance booking of media rooms.

Also, another constraint of using videos, as highlighted by the experts, is that in a class of heterogeneous students (mixed ability group), there are various kinds of learners. Some are unable to comprehend what is being said in the videos as most videos we use are of authentic English. They feel that the speakers speak too fast and are unable to grasp the content.

#### **CONCLUSIONS AND IMPLICATIONS**

In this study, it explores the impact of using video in ESL classroom. The FDM gave insights in the areas measured which are the advantages, the effectiveness and limitations of using video in ESL classroom. In designing and conducting an instructional plan applying the principles for use of video in classroom, the results indicated that the use of videos in ESL classroom can cognitively stimulate learning and at the same time, be an effective instructional tool. In the context of teaching and learning, videos are used as a repository to assist both lecturers and students. This is aligned and answers the objective of this study.

On the other hand, teachers and lecturers do acknowledge the limitation of using videos in ESL classroom. The lack of facilities and the limitation of time in choosing and providing the right video to be used in classroom needs to be given attention by the management of schools and institutions. Although there are limitations, there is potential in applying video in classroom as the advantages have far greater impact to the students learning. Future studies should focus on different subject areas to investigate its potential and effectiveness and motivation. Instructional models for implementing videos in education such as the flipped classroom model (Davies, Dean & Ball, 2013) are required as more research is required to investigate its effects on learning.



#### REFERENCES

- Ambard, P.D., & Ambard, L. K. (2012). Effects of narrative script advance organiser strategies used to introduce video in the foreign language classroom. *Foreign Language Annals*. Vol 45, No.2.
- Azlin Zainal (2012). ESL teachers' use of ICT in teaching English literature: An analysis of teachers' TPCK. *Procedia Social and Behavioral Sciences*. Vol. 34, 234-237.
- Bannick, A. (2009). How to capture growth? Video narratives as an instrument for assessment in teacher education. *Teaching and Teacher Education*. Vol 25, 244-250
  - Betil Eroz-Tuga (2013) Reflective feedback sessions using video recordings. ELT Journals. 67
- Beach, R., & Lundell, D. (1998). In D. Reinking, M. McKenna, L. Labbo, & R. Kieffer (Eds.), Handbook of literacy and technology: Transformations in a post-typographic world (pp. 93-112). Mahwah, NJ: Erlbaum.
- Bruce, B. C., & Hogan, M. P. (1998). The disappearance of technology: Toward an ecological model of literacy. In D. Reinking, M. McKenna, L. Labbo, and R. Kieffer (Eds.), Handbook of literacy and technology: Transformations in a post-typographic world (pp. 269-281). Hillsdale, NJ: Erlbaum
- Chen, H. J. H. (2011). Developing and evaluating SynctoLearn, a fully automatic video and transcript synchronisation tool for EFL learners. *Computer Assisted Language learning.* Vol. 24, No.2, April 2011, 117-130.
- Crook, A., Mauchline, A., et. (2012) The use of video technology for providing feedback to students: Can it enhance the feedback experience for staff and students? *Computers and Education* 58, 386-396
- Davies, R. S., Dean, D. L., & Ball, N. (2013). Flipping the classroom and instructional technology integration in a college-level information systems spreadsheet course. *Educational Technology Research & Development*, *61*, 563-580. DOI 10.1007/s11423-013-9305-6
- DeWitt, D., Alias, N., Siraj, S., Yaakub, M., Ayob, J., & Ishak, R. (2013). The potential of Youtube for teaching and learning in the performing arts. *Procedia Social and Behavioural Sciences*, *103*, 1118-1126.
- Doughty, C. J. & Long, M. H. (2003). Optimal psycholinguistic environments for distance foreign language learning. Language Learning & Technology, 7 (3), 50-80
- Dhonau, S., & McAlpine, D. (2008, December 31). "Streaming" Best Practices: Using Digital Video-Teaching Segments in the FI/ESL Methods Course. *Foreign Language Annals*, *35*(6)
- Garcia, L., Nussbaum, M., and Preiss, D. D. (2011) i the use of information and communication technology related to performance in working memory tasks? Evidence from seventh-grade students. *Computers and Education* 57, 2068-2076
  - Gagne, R. M. (1985). The conditions of learning (4th ed.). New York: Holt Rinehart & Winston
- Goldman, R. (2004). Video perspective meets wild and crazy teens: Design ethnography. *Cambridge Journal of Education*. 2(4), 147-169.
- Ghasemi, B., Hashemi, M., & Bardine, S. H. (2011). UTube and language learning. *Procedia-Social and Behaviour Sciences*, 28, 63-67

- Harlow, L., & Muyskens, J. (1994). Priorities for intermediate-level language instruction. *Modern Language Journal*, 78, 57-66
- Herron, C, & Hanley, J. (1992). Using video to introduce children to a foreign culture. *Foreign Language Annals*, 25, 419-426
- Herron, C., Corrie, C., Cole, S., & Dubrell, S. (1999). The effectiveness of a video-based curiculum in teaching culture. *Modern Language Journal*, *83*, 518-533.
- Huberman, G., & Medish, V. (1975). Spanish multi-channel instruction in operation: A progress report. *Foreign Language Annals*, *8*, 49-52.
- Hie Chi Yang, Chih Hung Chen and Ming Chang Jeng (2010). Integrating video capture virtual reality technology into a physically interactive learning environment for English learning. *Computers and Education*. *5*, 1346-1356
- Johnston, J., & Milne, L. (1995). Scaffolding second language communicative discourse with teacher-controlled multimedia. *Foreign Language Annals*, 28, 315-329.
- Kamil, M.L., Intrator, S., & Kim, H. (2000). The effects of other technologies on literacy and literacy learning. In M.L. Kamil, P.B. Mosenthal, P.D. Pearson, & R. Barr (Eds.) *Handbook of reading research* (Vol.III, pp. 771-788). Mahwah, NJ: Lawrence Erlbaum.
- Lee, Y. J., & Liang, J. (2012). Using Video Technology to Diagnose EFL Students' Cognitive Learning Difficulties in Public Speaking. *Procedia Social and Behavioural Sciences*, 671-680.
- Littlewood, W. (2001). Cultural awareness and the negotiation of meaning in intercultural communication. *Language Awareness*, *10*,189-99.
- Lindstrom, R. (1994). The Business Week Guide to Multimedia Presentations: Create Dynamic Presentations That Inspire, New York: McGraw-Hill
- Masats, D. and Dooly, M. (2011) Rethinking the use of video in teacher education: A holistic approach. *Teaching and Teacher Education*. 27, 1151-1162
- Manning, J. (1988). Using television/video as primary text in a foreign language classroom at the University of Colorado, Denver. *Foreign Language Annals*. 21,455-461.
  - McGlothlin, J.D. (1997). A child's first steps in language learning. The internet TESL Journal, 3. (10)
- Morgan, A. (2007) Using video-stimulated recall to understand young children's perceptions of learning in classroom settings. *European Early Childhood Education Research Journal*. 15, 213-226
- Norlidah. A., Dewitt. D & Saedah.S (2013) Development of Science Pedagogical Module: based on learning styles. Pearson (M) Sdn Bhd., Kuala Lumpur.
- O'Loughlin J., Chroinin D.N., O'Grady D. (2013). Digital video: The impact on children's learning experiences in primary physical education. European Physical Education Review, 9 (2). 165-182. doi: 10.1177/1356336X13486050
- Roblyer, M.D., & Doering, A.H.(2010). *Integrating educational technology into teaching* (5th ed.). Boston, MA: Allyn & Bacon.



- Salomon, G. (1984). Television is "easy" and print is "tough": The differential investment of mental effort in learning as a function of perceptions and attributions. *Journal of Educational Psychology*, 76, 647-658
- Seidal, T., Blomberg, G. and Renkl, A. (2013) Instructional strategies for using video in teacher education. *Teaching and Teacher Education* 34, 56-65
- Silverman, R. (2013). Investigating video as a mean to promote vocabulary for at-risk children. *Journal of Contemporary Educational Psychology* 38(2013). 170-179
- Silverman, R., & Hines, S. (2009). The effects of multimedia enhanced instruction on the vocabulary of English language learners and non-English language learners in pre-kindergarten through second grade. *Journal of Educational Psychology*, 101(2), 305-314.
- Secules, T., Herron, C., & Tomasello, M. (1992). The effect of video context on foreign language learning. *Modern Language Journals*, 76, 480-490.
  - Shrum, J., & Gilsan, E. (2005). Teachers handbook (3rd ed.). Boston: Heinle
- South, J. B., Gabbitas, B., & Merrill, P. F. (2008, December). Designing video narratives to contextualise content for ESL learners: a design process case study. *Interactive Learning Environments*, 16(3), 231-243.
- Svensson, S., & Borgarskola, M. (1985). Video, authenticity, and language for special purposes teaching. *Foreign Language Annals*, 18, 499-517.
- Yang, J. C., Chen, C.H., Jeng, M.C. (2009). Integrating video-capture virtual reality technology into a physical interactive learning environment for English learning. *Journal of Computers and Education*, 55(2010), 1346-1356.
- Verhallen, M. J. A. J. & Bus, A. G. (2009). Video Storybook Reading as a Remedy for Vocabulary Deficits: Outcomes and Processes. Journal for Educational Research Online, 1 (1), 172-196
- Verhallen, M. J. A. J., Bus, A. G. & De Jong, M. T (2006). The promise of multimedia stories for kindergarten children at risk. *Journal of Educational Psychology*, *98*, 410-419.
- Weins, P. D., Hessberg, K., LoCasale-Crouch, J., DeCoster, J. (2013) Using a standardized video based assessment in a university teacher education program to examine preservice teachers knowledge related to effective teaching. *Teaching and Teacher Education*. 33, 24-33
- Zahn, C., Krauskopf, K., & Hesse, W.F. (2012). How to improve collaborative learning with video tools in the classroom? Social vs. cognitive guidance for student teams. *Computer-Supported Collaborative Learning* (2012) 7:259-284