Virtual Field Trips for Teaching and Learning

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Background

- ASEAN Vision of 2020
  - To establish “A Zone of Peace, Freedom, and Neutrality”, bonded together in partnership in dynamic development and in a community of caring societies (Kuala Lumpur Declaration, 1971)
ASEAN Community

- Is comprised of three pillars
  - ASEAN Political-Security Community (APSC)
  - ASEAN Economic Community (AEC)
  - ASEAN Social-Cultural Community (ASCC)

- One of Key aspects: culture learning and sharing
Field Trips vs. Virtual Field Trips

- **Field Trips (FTs)**
  - Lead learners to interact with what they are really learning & learning experience go beyond reading
  - Bridge formal & information learning & prepare learners for lifelong learning (Ththil & Klemm, 2002).

- **Virtual Field Trips (VFTs)**
  - Help educators to overcome some of concerns and difficulties related to field trips such as lack of funding, resources, logistical and preparation problems.
Virtual Field Trips (VFTs)

- Was first appeared around 1995, and have gained in popularity since 2000 due to the power of technology.
- VFTs or Electronic field trips (EFTs) are used to describe a broad range of multimedia integration.
VFTs – Definitions

• Consist of set of links and/or navigation buttons that provide users to move through on Web pages with a particular theme which can be used in either blended course or online course (Foley, 2003).

• Is commonly used to describe “any activities on computer that a user browses, step-by-step, link-by-link, click-by-click through a set of linked web-pages to acquire information about a field site or location” (Qiu & Hubble, 2002, p. 76).
VFTs - Definitions

• Is “an interrelated collection of images, supporting text and/or other media, delivered electronically via the WWW, in a format that can be professionally presented to relate the essence of a visit to a time or place” (Nix, 1999, p. 1).
VFT - Characteristics

• Extracting key aspects from these definitions, VFTs involve electronic travel via the Internet, beyond the classroom in either place or time for the purpose of learning and teaching.
VFT - Characteristics

• Is distinguished from “Virtual Reality”.
• VFT is simply “an attempt to place further autonomy in user’s hand, by allowing observations to be made without being on the actual site or having a lecture at hand to explain” (Stainfield, et al., 2000, p. 256).
VFTs – Advantages

- VFTs are powerful tools for reforming teaching & learning in higher education.
- VFTs solve many instructional & logistical problems report by teachers as associated with actual field trips.
- VFTs provide “a way to transport the class to community professionals who are able to powerfully demonstrate the value and utility of what is being learning in the course” (Cox & Su, 2004, p. 113).
- VFTs facilitate high quality learning experience by integrate VFTs into curriculum (Adedokun, et al., 2011; Cox & Su, 2004; Malewski, et al., 2005; Stainfield, et al., 2000)
VFTs - Disadvantages

• Students may or may not be comfortable using the necessary hardware or software.

• Students and teachers must have access to a computer & Internet either at home or at school.

• Development & Network access costs.
Core Elements of VFTs

- Clear goals, objectives and learning outcomes
- Linked to the curriculum
- Authenticity
- Collaboration between teachers, students, & field site experts
- Interactive multi-media technology
- Pre-VFT activity, during-VFT activity, & post-VFT activity support
- Theory based pedagogical approach
- Assessment & Evaluation

Source Adapted from (Adedokun et al., 2011; Hovell, 2003; Stoodard, 2009).
ASEAN Virtual Field Trips Program Model

Phase

Needs Analysis

- Analysis of target learners & environment
  - Learner characteristics
  - Learning objectives & outcomes (cognitive & affective domains)
  - Learning environment: virtual field trips

Process

Preparation for teachers and students

- Teaching & Learning Design Unit
  - Learning activity: Pre-VFT activity, During VFT activity, and Post-VFT activity
  - Multimedia: pre-made video, images, graphic, audio clips
  - Resources: contents, courseware

- Assessment & Evaluation

Elements

- Goal, objectives & outcomes are linked with Curriculum
- Design unit is based on theory & pedagogical approach: Constructivist approach, ARCS model, authentic, and cooperative learning

Prototype Provide to Learners
1. Guideline: virtual visit, trip journal, discussion, reflection, and rubric

Provide to Teachers
1. Guideline: lesson plan, artifacts, instructional strategy
2. Rubrics

Evaluation

- Assessment & Evaluation
  - Assessment: learning process, activity organization, and curriculum.
  - Evaluation: formative & summative

Revision & Improvement

- Curriculum & Instruction Revision

- Analysis Report
- Design Unit Report
- Assessment & Evaluation Report
VFT Learning Activities

**Pre-VFT Activity**
- Instructor distributes guidelines:
  1. virtual visit,
  2. trip journal,
  3. discussion,
  4. reflection,
  5. rubric to students

**Virtual Visit**
- Students have their first virtual visit on VFT site.

**Trip Journal**
- After their first virtual visit on VFT site, they write up a trip journal.

**Discussion**
- After their first virtual visit on VFT site, instructor distributes some discussion questions on discussion boards. Students discuss, interact, and engage with their peers, teacher, or expert on asynchronous communication throughout VFT.

**Reflection**
- After a virtual visit and discussion and interaction with peers, students reflect themselves and write up a reflection paper (self-assessment).

**During VFT Activity**
- Instructor or expert leads activity during VFT.

**Trip Journal**
- During VFT, students may take notes, photos, or video record to support their trip journal.

**Collaboration & Interaction**
- During VFT, instructor or experts will assign some tasks for students to collaborate, discuss, and interact with each other.

**Post-VFT Activity**
- Reflection
  - After VFT, students write up their reflection on lesson learned of VFT.

- Feedback
  - After VFT, students provide feedback on VFT activity.

**Ready for an actual visit?**
- No
- Yes
Question or Comments?
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