

Using Mobile Technology for Assessment

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Session Overview

With the infusion of mobile technology into education and society, the ability of teachers to more effectively assess student learning in the content teaching can become a seamless process. In this session participants will be shown web-based, desktop based and mobile applications that can enhance the assessment of not only students in K-12 physical education settings but teacher education candidates as well.

Mobile Applications-Overview and Implications

Designing Assessments using Web-Based and Mobile Applications



Wufoo On-Line Form Builder: <http://www.wufoo.com/>

The Wufoo website allows the user to build multiple types of forms and templates for assessment of student learning or evaluation of teaching. Users may create up to three forms with up to ten response items for free with an entry capacity of 100 per month. This would allow the K-12 practitioner to evaluate 100 students using a specific user developed assessment one time per month. A monthly membership fee of \$14.95 allows the practitioner to develop up to ten assessments, which have unlimited response items, allowing up to 500 records per month.



Pico Interface for Wufoo on iPad/iPhone/iPod Touch <http://xidlabs.com/pico-for-wufoo>

The Pico App then allows the user to use their iPhone, iPad or iPod Touch to enter student assessment results into their custom designed assessments. Entries that are recorded on the mobile device are transferred to web storage on the Wufoo site or can also be directed to either Dropbox or iCloud to expand storage capacity. This allows the teacher to do evaluations quickly and easily during class sessions.



Numbers App for iPad/iPhone/iPod Touch <https://itunes.apple.com/us/app/numbers/id361304891>

This application is an iPad version of desktop versions of Excel for Windows/Mac. The app allows easy input and custom design of assessment spreadsheets with features such as check boxes, sliders, steppers, pop-up menus and other types of formulas or entry cells making the design and use of instruments that make the assessment of multiple students quick and easy. This application has an initial cost of \$9.99 which enables all of its functions.

Assessing Student Skill Acquisition/Performance



Ubersense Video Analysis Application <http://www.ubersense.com/>

This application allows the teacher to video tape performance of students as they perform various skills during class settings. The teacher can then watch the video and provide annotation including circles, lines, joint angles and/or free hand lines along with voice narration to provide feedback to the student on performance. Multiple trials can be recorded and compared to assess skill acquisition and to show the student improvement. Videos with annotation can

then be exported to cloud storage or apps such as Dropbox or posted to YouTube or shared via email (for short clips). If using the course management system Canvas by Instructure (<http://www.instructure.com>), the videos can be sent directly to students with assessment embedded.



Canvas by Instructure <http://www.instructure.com>

Among the multiple functions of Canvas, the ability to utilize and custom design rubrics embed video and URL links allow the teacher to have an effective content delivery system for assessing student's skill performance. The course management system, which is free, allows the teacher to design rubrics to evaluate student performance as well as manage a course overall. When combined with mobile applications of Canvas and Speed Grader. The interface of the course management system with mobile devices becomes seamless allowing video uploads to be done easily, and assessment rubrics can be completed on site with direct uploads to the web-based grade-book.

Using Mobile Technology to Assess Teaching and Teacher Development



Digital Voice Recorders, Numbers and/or Microsoft Excel

Digital voice recorders can be valuable pieces of technology for developing teaching skills. One of the advantages is they allow the teacher to analyze the dialogue used when teaching, evaluating communication patterns, question types, feedback and other variables. It is also advantageous for university supervisors. By only recording dialogue for assessment, video taping of children is not performed ensuring compliance with policies of some school districts. By using spreadsheets designed on Numbers or Microsoft Excel, the resultant dialogue can then be analyzed to improve teacher to student communication.



Dragon Dictation <https://itunes.apple.com/us/app/dragon-dictation/id341446764?mt=8>

This app allows the university supervisor/teacher to provide feedback to students converting voice to text. The resultant text can then be emailed to the student or copied and embedded in the feedback sections of Speed Grader to be placed in the grade book of Canvas.



Camtasia Studio <http://www.camtasiastudio.com/camtasia/index-camtasia-us.htm>

This video screen capture software provides a unique way of providing annotated voice/video over feedback to students on assignments. The software captures the computer screen and the teacher can scan papers, lesson plans or other documents providing feedback to the student then forward the resultant video to students for them to view via desktop or mobile device.