Indiana University - Purdue University Fort Wayne Opus: Research & Creativity at IPFW

2014 IPFW Student Research and Creative **Endeavor Symposium**

IPFW Student Research and Creative Endeavor Symposium

3-28-2014

Director-Matcher Task Project

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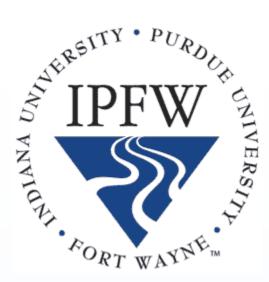
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Recommended Citation

Fowler, Max; Abraham, Rachel; Martin, Braxton; and Bohan, David, "Director-Matcher Task Project" (2014). 2014 IPFW Student Research and Creative Endeavor Symposium. Book 56.

http://opus.ipfw.edu/stu_symp2014/56

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Objective & Purpose

This IPFW team is collaborating with an international group of linguists to create a flexible online toolkit. That toolkit, the Digital Director-Matcher Toolkit, will be used for linguistic research and will be adaptable for the use of other cognitive research such as memory, problem-solving, and knowledge based learning studies. Later this year, 2014, we will have the software tested and ready to download from and use.

The Digital Director-Matcher Toolkit is contributing to a global research venture by utilizing the internet and digitalizing traditional scientific methods in order to collect international samples.

Introduction

For Linguistic use, the Digital Director-Matcher Toolkit, DDMT for short, will aid in the study the cognitive language-switching habits of multi-lingual speakers. This is done by observing an online game designed to trigger language shifts. The chess-like game designed to do this was developed at the University of Bangor's bilingual research center. However, Bangor's game required participants to be in the same physical location and receive instruction from also present administrators who painstakingly had to record each move. This is where the DDMT comes in. The toolkit can be used by participants from around the world and administrators who observe and collect data from the DDMT with ease.

While the DDMT has a specific purpose in linguistics, our team has designed the toolkit to be more universal and user friendly. The toolkit can easily be customized to suit the needs of other research endeavors. Administrators need only Install the DDMT and start clicking.

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Dr. Maria del Carmen Parafita Couto,

Dr. Hans Stadthagen, Dr. Catherine Mazak Recinto The Digital

Director - Matcher

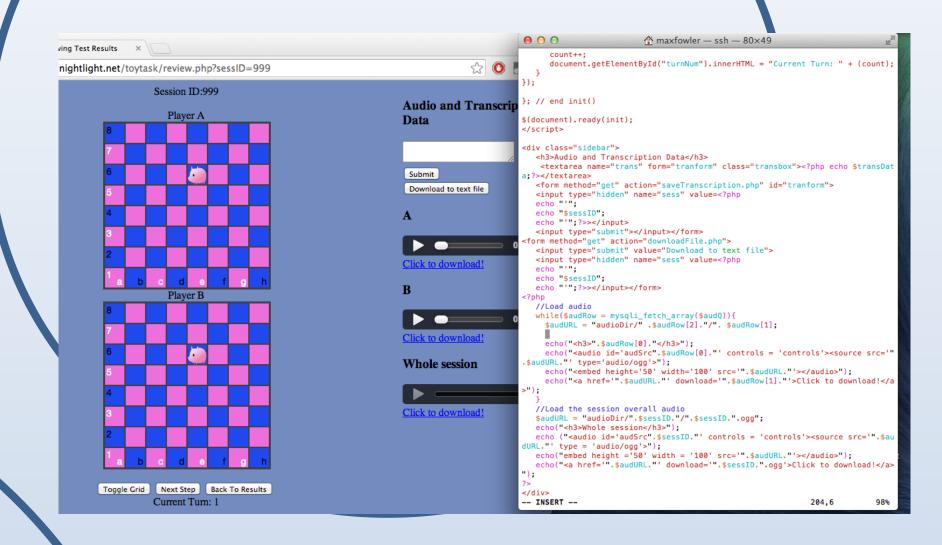
Toolkit



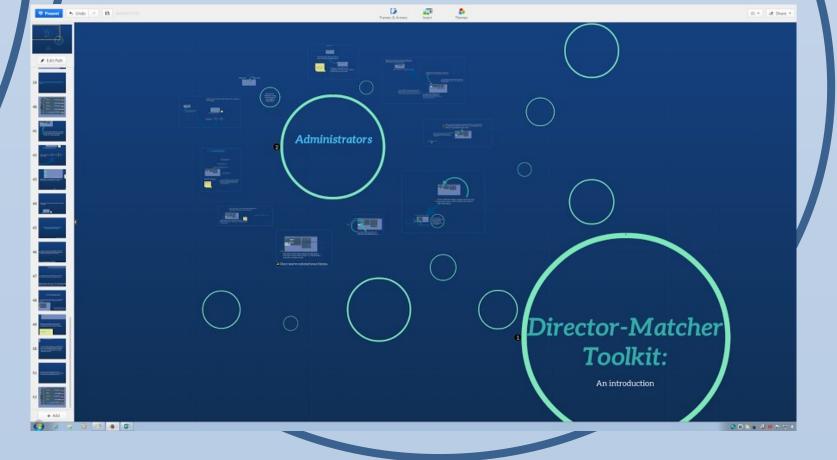




Creating the Toolkit



Creating the Tutorial & Storyboard



Methodology

General Functions

- The Digital Director-Matcher Toolkit 2.0 will be available online later this year.
- Administrators login to create, track, and view the results of participants' sessions.
 - Participants login to commence sessions.
- Confederates login to play sessions with participants and guide board-play by following written administrator instruction.
 - Transcribers login to open finished sessions and record saved data.
 - Readme, manual, and creator assistance will be available for DDMT 2.0

Toolkit Enhancements:

- ⇒ Removed non-control language triggers by:
- Replacing labeled buttons with symbols and
- Connecting participants and testers from across the globe online
 - DDMT 2.0 will digitally capture the following for data analysis:
 - Board states
 - · Players' session call
 - Confederate scripts

and download at end of session as .pdf

Customizable Settings:

- Add up to 6 players in a game
- · Variety of pre-loaded game pieces for administrators to select from
- Prompt confederates with scripts
- Ability to upload custom .png game pieces
- Add or remove grid from the chess table

Conclusion

The Digital Director-Matcher Toolkit team has just finished version 1.0! Our team of two computer science majors, a technical writer, and a Spanish major has collaborated with the linguistics department to create this immediately useful and universal online research toolkit.

Session Play



Administrator Customization

