### III. Appendix III. Experiment 3

**Institutional Review Board**

**Request for Exempt Review**

**Directions**

This form must be typed and submitted (as a Word document) to the IRB office electronically along with the other required documents (e.g., Initial Review Application, all study forms relating to human subjects, and bio-sketches of investigators) to irb@vt.edu. In addition to submitting electronically, this form, signed by all appropriate parties, must be received by the IRB office before the submission is processed. Mail or deliver the original signed copy of this form to: IRB, Virginia Tech, Office of Research Compliance, 1800 Pratt Drive, Suite 2006 (8497), Blacksburg, VA 24061. To speed up the approval process, signed Review Forms may be scanned or faxed [(540) 231-0959] to the IRB office; however, the original signatures must also be mailed or delivered to the IRB office for documentation.

**Section 1: Contact Information**

<table>
<thead>
<tr>
<th>Principal Investigator (Faculty or Faculty Advisor) (all fields required)</th>
<th>HST = Human Subjects Training</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name: Edward A. Fox</td>
<td>PID: fox</td>
</tr>
<tr>
<td>Department: Computer Science</td>
<td>What is a PID? (scroll over)</td>
</tr>
<tr>
<td></td>
<td>Email: <a href="mailto:fox@vt.edu">fox@vt.edu</a></td>
</tr>
<tr>
<td>Signature of Principal Investigator</td>
<td>HST completed through:</td>
</tr>
<tr>
<td></td>
<td>Mail Code: 0106</td>
</tr>
</tbody>
</table>

**Co-Investigator(s) (Faculty or Student) (all fields required for each Co-Investigator)**

<table>
<thead>
<tr>
<th>Co-Investigator #1</th>
<th>HST completed through: VT blackboard course</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name: W. Ryan Richardson</td>
<td>PID: wiricha2</td>
</tr>
<tr>
<td>Organization Name: Virginia Tech</td>
<td>Email: <a href="mailto:wiricha2@vt.edu">wiricha2@vt.edu</a></td>
</tr>
<tr>
<td>Signature of Co-Investigator #1</td>
<td>Date</td>
</tr>
</tbody>
</table>

**Co-Investigator #2**

<table>
<thead>
<tr>
<th>Name:</th>
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<tbody>
<tr>
<td>Organization Name:</td>
<td>Email:</td>
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<tr>
<td>Signature of Co-Investigator #2</td>
<td>Date</td>
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</tbody>
</table>

**Co-Investigator #3**

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<tr>
<td>Organization Name:</td>
<td>Email:</td>
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<tr>
<td>Signature of Co-Investigator #3</td>
<td>Date</td>
</tr>
</tbody>
</table>

**Co-Investigator #4**

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<tr>
<td>Organization Name:</td>
<td>Email:</td>
</tr>
<tr>
<td>Signature of Co-Investigator #4</td>
<td>Date</td>
</tr>
</tbody>
</table>

**Departmental Reviewer:** (not required for all departments)

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<thead>
<tr>
<th>Name:</th>
<th>PID:</th>
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</thead>
<tbody>
<tr>
<td></td>
<td>Date</td>
</tr>
</tbody>
</table>

*Revised 22 February 2006*
Section 2: General Information
1. Project Title: Summarizing Electronic Theses About Computing Using Automatically Generated Concept Maps
   Enter title as you would like it to appear on the official IRB approval letter.

2. Number of Human Subjects: 15

3. Do any of the investigators on this project have a reportable conflict of interest? No If yes, explain:
   ![checkbox]
   All investigators of this project are qualified through completion of human subject protections education. Visit our website at http://www.irb.vt.edu/pages/training.html to view training opportunities accepted by the VT IRB. (Note: Do not submit your IRB application until all investigators are qualified)
   ![checkbox]
   All investigators listed on this project, along with the departmental reviewer (if applicable), have reviewed this IRB application and all requested revisions from these parties have been implemented into this submission. (Note: Do not submit your application until all parties have reviewed and signed off on the final draft of the materials)

Section 3: Source of Funding
4. Source of Funding Support (check one box):
   ![checkbox]
   Departmental Research [If Dept. Research, skip in Section 4]
   [ ] Sponsored Research, including VARIOUS funds & OAS/VT Foundation funds [If Sponsored Research, respond to letters A-D below]

   A. Name of Sponsor [If NIH, specify department]:
   B. Title of study as listed on OSP application:
   C. OSP number: * Proposal # (enter 8 digit number, no dashes/spaces): , OR
   * Grant # (enter 6 digit number, no dashes/spaces): , OR
   * OSP # pending (check box if pending): [ ]

   D. Is this project receiving federal funds (e.g., DHHS, DOD, etc.): select one

Section 4: Exemption Criteria
   Notes: To qualify for Exemption, the research must meet all of the following criteria (a – f):
   (a) Be of minimal risk to the subject; AND
   (b) Must not involve pregnant women, prisoners or mentally impaired persons; AND
   (c) Must not include survey research with minors unless involving standard educational activities (e.g., educational tests) within the particular education system; AND
   (d) Must not include observation of a minor’s public behavior unless there is no researcher interaction, AND
   (e) Research must not involve video or audio recording of subjects; AND
   (f) Must be in one or more of the following categories:

5. Please mark/check the appropriate category or categories below which qualify the proposed project for exemption:
   ![checkbox]
   1. Research will be conducted in established or commonly accepted educational settings, involving normal educational practices, such as (a) research on regular and special education instructional strategies, or (b) research on the effectiveness or the comparison among instructional techniques, curricula or classroom management methods.
   ![checkbox]
   2. Research will involve the use of educational tests (cognitive, diagnostic, aptitude, achievement), survey procedures, interview procedures or observation of public behavior, unless the subjects can be identified directly or through identifiers linked to the subjects and disclosure of responses could reasonably place the subjects at risk or criminal or civil liability or be damaging to the subjects’ financial standing, employability or reputation.
   ![checkbox]
   3. Research will involve the use of educational tests (cognitive, diagnostic, aptitude, achievement), survey procedures, interview procedures, or observation of public behavior that is not exempt under item (2) above if (a) the subjects are elected or appointed public officials or candidates for public office; or (b) Federal statute(s) requires that the confidentiality or other personally identifiable information will be maintained throughout the research and thereafter.
   ![checkbox]
   4. Research will involve the collection or study of existing data, documents, records, pathological specimens, or diagnostic specimens, if these sources are publicly available or if the information is recorded by the investigator in such a manner that subjects cannot be identified directly or through identifiers linked to the subjects.
   ![checkbox]
   5. Research and demonstration projects which are conducted by or subject to the approval of federal agency sponsoring the research, and which are designed to study, evaluate or otherwise examine (a) public benefit or service programs, (b) procedures for obtaining benefits or services under these programs, (c) possible changes in or alternatives to those programs or procedures, or (d) possible changes in methods or levels of payment for benefits or services under these programs.
   ![checkbox]
   6. Taste and food quality evaluation and consumer acceptance studies, if (a) wholesome foods without additives are consumed, or if (b) a food is consumed that contains a food ingredient at or below the level and for a use found to be safe, by the Food
and Drug Administration or approved by the Environmental Protection Agency or the Food Safety and Inspection Service of the U.S. Department of Agriculture.
DATE: September 27, 2005

MEMORANDUM

TO: Edward A. Fox
William Richardson

FROM: David M. Moore


Approval date: 9/27/2006
Continuing Review Due Date: 9/12/2007
Expiration Date: 9/29/2007

This memo is regarding the above-mentioned protocol. The proposed research is eligible for expedited review according to the specifications authorized by 45 CFR 46.110 and 21 CFR 56.110. As Chair of the Virginia Tech Institutional Review Board, I have granted approval to the study for a period of 12 months, effective September 27, 2008.

As an investigator of human subjects, your responsibilities include the following:

1. Report promptly proposed changes in previously approved human subject research activities to the IRB, including changes to your study forms, procedures and investigators, regardless of how minor. The proposed changes must not be initiated without IRB review and approval, except where necessary to eliminate apparent immediate hazards to the subjects.
2. Report promptly to the IRB any injuries or other unanticipated or adverse events involving risks or harms to human research subjects or others.
3. Report promptly to the IRB of the study's closing (i.e., data collecting and data analysis complete at Virginia Tech). If the study is to continue past the expiration date (listed above), investigators must submit a request for continuing review prior to the continuing review due date (listed above). It is the researcher's responsibility to obtain re-approval from the IRB before the study's expiration date.
4. If re-approval is not obtained (unless the study has been reported to the IRB as closed) prior to the expiration date, all activities involving human subjects and data analysis must cease immediately, except where necessary to eliminate apparent immediate hazards to the subjects.

Important:
If you are conducting federally funded non-exempt research, this approval letter must state that the IRB has compared the OSP grant application and IRB application and found the documents to be consistent. Otherwise, this approval letter is invalid for OSP to release funds. Visit our website at http://www.irb.vt.edu/pages/newstudy.htm#OSP for further information.

cc: File
DATE: October 2, 2006

MEMORANDUM

TO: Edward A. Fox
    William Richardson

FROM: David M. Moore

SUBJECT: IRB Amendment 1 Approval: "Summarizing Electronic Theses About Computing Using Automatically Generated Concept Maps", IRB # 06-527

This memo is regarding the above referenced protocol which was previously granted approval by the IRB on September 27, 2006. You subsequently requested permission to amend your IRB application. Since the requested amendment is non-substantive in nature, I, as Chair of the Virginia Tech Institutional Review Board, have granted approval for requested protocol amendment, effective as of September 29, 2006. The anniversary date will remain the same as the original approval date.

As an investigator of human subjects, your responsibilities include the following:

1. Report promptly proposed changes in previously approved human subject research activities to the IRB, including changes to your study forms, procedures and investigators, regardless of how minor. The proposed changes must not be initiated without IRB review and approval, except where necessary to eliminate apparent immediate hazards to the subjects.

2. Report promptly to the IRB any injuries or other unanticipated or adverse events involving risks or harms to human research subjects or others.

3. Report promptly to the IRB of the study's closing (i.e., data collecting and data analysis complete at Virginia Tech). If the study is to continue past the expiration date (listed above), investigators must submit a request for continuing review prior to the continuing review due date (listed above). It is the researcher's responsibility to obtained re-approval from the IRB before the study's expiration date.

4. If re-approval is not obtained (unless the study has been reported to the IRB as closed) prior to the expiration date, all activities involving human subjects and data analysis must cease immediately, except where necessary to eliminate apparent immediate hazards to the subjects.

cc: File
Summarization Questionnaire (Type A first version)

Please enter your 4-digit user number:

What is the ID number of the thesis you just skimmed?

III.1 Task 1

Please list the 10 to 15 most important concepts in the thesis you just read. List in order from most important to least important. Note that a concept can be expressed as one word, or as a phrase.

III.2 Concept Map Type A

Please examine the concept map in the CMapTools application. Its file name will end in '_A'. Once you have examined it, please select the number that best describes your opinion of the statement.

The nodes in the concept map correspond to the most important concepts in the ETD.

Strongly disagree 1 2 3 4 5 Strongly agree

Based on the label text, the links in the concept map connect the proper nodes in the concept map.

Strongly disagree 1 2 3 4 5 Strongly agree
The relationships expressed by the links in the concept map are the most important relationships in the ETD.

Strongly disagree 1 2 3 4 5 Strongly agree

Hovering over link text (usually) shows one or more sentences from the original document pertaining to the relation between the concepts.
I found this to be helpful.

Strongly disagree 1 2 3 4 5 Strongly agree

The concept map is useful for deciding if you want to read the ETD.

Strongly disagree 1 2 3 4 5 Strongly agree

III.3 Concept Map Type B

Please examine the concept map in the CMapTools application. Its file name will end in '_B'. Once you have examined it, please select the number that best describes your opinion of the statement.

The nodes in the concept map correspond to the most important concepts in the ETD.

Strongly disagree 1 2 3 4 5 Strongly agree

The links in the concept map connect the proper nodes in the concept map.

Strongly disagree 1 2 3 4 5 Strongly agree
The relationships expressed by the links in the concept map are the most important relationships in the ETD.
Strongly disagree  1  2  3  4  5  Strongly agree

Hovering over link text (usually) shows one or more sentences from the original document pertaining to the relation between the concepts.
I found this to be helpful.
Strongly disagree  1  2  3  4  5  Strongly agree

The concept map is useful for deciding if you want to read the ETD.
Strongly disagree  1  2  3  4  5  Strongly agree

If you have any comments/suggestions on any of the three concept maps that you were just presented with, please enter them here.