Exemption under Title 45 CFR §46.101
(b)(1) exempts research conducted in established or commonly accepted educational settings, involving normal educational practices, such as
(i) research on regular and special education instructional strategies, or
(ii) research on the effectiveness of or the comparison among instructional techniques, curricula, or classroom management methods.

PLEASE BE AWARE that you cannot begin the project until you have received notification that the exemption has been granted.

1. **Project Title:**
   SMARTER Teamwork: System for Management, Assessment, Research, Training, Education, and Remediation for Teamwork

2. **Anticipated Funding Source:**
   National Science Foundation

3. **Principal Investigator** [See Policy on Eligibility to serve as a Principal Investigator for Research Involving Human Subjects]:
   Matthew W. Ohland, Associate Professor, ENE, ARMS, 496-1316, 494-5819, ohland@purdue.edu

4. **Co-Investigators and key personnel** [See Educ. Policy for Conducting Human Subjects Research]:
   Richard Layton, Associate Professor, Mechanical Engineering, Rose-Hulman Institute of Technology, CM 145, Phone 812-877-8905, Richard.A.Layton@Rose-Hulman.edu
   Misty L. Loughry, Associate Professor of Management, Georgia Southern University, COBA 3349, Phone 912-478-0756, mloughry@georgiasouthern.edu
   Eduardo Salas, University of Central Florida, Institute for Simulation & Training
   3100 Technology Parkway, FL 32826, Phone 407-882-1325, esalas@ist.ucf.edu
   David J. Woehr, Professor of Management, University of Tennessee (Knoxville), 411 Stokely Management Center, Phone 865-976-1673, djw@utk.edu
   Julia A. Phillips, Undergraduate Researcher, Phone 765-714-8889, japhilli@purdue.edu
   Gregory J. Ross, Undergraduate Researcher, Phone 219-742-4587, gjross@purdue.edu

5. **Consultants** [See Education Policy for Conducting Human Subjects Research]:
   Hal R. Pomeranz, Principal, Deer Run Associates, 3600 Vine Maple St. Eugene, OR 97405, Phone 541-683-8680, Fax: 541-683-8681, hal@deer-run.com

6. **Anticipated Duration of Study:** Please indicate when this project will end.
   Project END Date: August 14, 2013
7. Expected Age Range

Check all that apply:

- [ ] 0-7
- [X] 8-17
- [X] 18-64
- [ ] 65 and older

8. Describe location of subjects during research data collection

Check all that apply:

- [X] Purdue University, specify campus: West Lafayette
- [ ] Elementary/Secondary Schools, specify:
- [ ] Community Center, specify:
- [X] Other University Campus, specify: 120 campuses total, data collected electronically
- [ ] Subject’s Home, specify:
- [X] International Location, specify: See attached list of universities using the system
- [ ] Other location, specify:

Research procedures or recruitment conducted off-campus within a school, business, or other setting must have permission from an appropriate authority associated with that site.

[X] I have attached letters of permission from the appropriate authority allowing the research to occur at the proposed setting(s). Permission granted by selective release using an online system each time a survey is completed.

In the case of research conducted in educational settings (i.e. primary and secondary schools, institutions of higher education, etc.), please note that you should check with each school district you will work with to determine if separate school IRB approval or district approval is required.

9. Briefly state your research question.

To what extent can a system be designed to support the management, assessment, research, training, education, and remediation of teamwork, primarily in higher education?

10. Will the activity/activities occur during class time or outside of class time?

[X] During Class Time

[X] Outside of Class Time
11. What research activity/activities will take place?  
(check all that apply, then check if subjects can choose not to participate)

<table>
<thead>
<tr>
<th>Activity</th>
<th>Can Subjects Choose Not to Participate?</th>
</tr>
</thead>
<tbody>
<tr>
<td>X Implementation of a novel educational method</td>
<td>YES NO</td>
</tr>
<tr>
<td>Describe how it differs from the standard method:</td>
<td></td>
</tr>
<tr>
<td>Students participate in teams formed using novel strategies and evaluate their peers using a novel system. Novel approaches such as video-based modeling will be used to teach team effectiveness to students and team management to faculty. Students cannot choose not to participate because team formation and peer evaluation data are being collected as a routine part of team management in the classroom. Further, it would be impossible to understand team dynamics without peer evaluation data from each of the students on a team.</td>
<td></td>
</tr>
<tr>
<td>X Review and collection of student grades and standardized test scores</td>
<td>YES NO</td>
</tr>
<tr>
<td>Describe what scores or grades will be collected:</td>
<td></td>
</tr>
<tr>
<td>In some parts of this research, course grades (particularly team project scores) may be shared with the researchers after personally identifiable information has been removed.</td>
<td></td>
</tr>
<tr>
<td>X Will you be observing and recording data on teacher or student?</td>
<td>YES NO</td>
</tr>
<tr>
<td>1. Indicate teacher or student below:</td>
<td></td>
</tr>
<tr>
<td>□ On Teacher</td>
<td>□ On Student</td>
</tr>
<tr>
<td>2. How will the data be recorded?</td>
<td></td>
</tr>
<tr>
<td>□ Written Notes</td>
<td>□ Audio</td>
</tr>
<tr>
<td>□ Video</td>
<td>□ Photographs</td>
</tr>
<tr>
<td>X Use of questionnaires, interview questions, etc. If applicable, include a copy.</td>
<td>YES NO</td>
</tr>
<tr>
<td>Describe procedures to be followed:</td>
<td></td>
</tr>
<tr>
<td>Students are taught to work in teams in various ways, and faculty attempt various ways to remediate team problems. Students engage in online surveys related to team formation and peer evaluation as part of classroom activity. Faculty provide feedback on team functioning.</td>
<td></td>
</tr>
<tr>
<td>X Other.</td>
<td>YES NO</td>
</tr>
<tr>
<td>Describe:</td>
<td></td>
</tr>
</tbody>
</table>
12. Will the activity occur regardless of whether you are conducting research or not?
X YES
☐ NO

13. Describe what non-participants will do during the research (activities and supervision):
It is important that the study design not penalize students who will not be participating if not all students will be participating.

There are no non-participants.

Compensation

14. Will you give subjects gifts, payments, compensation, reimbursement, services, or extra credit?
☐ YES
X NO

Note: If extra credit will be offered for participation in the research activity, an alternative activity must be provided to non-participating students for a comparable amount of credit.
If yes, please explain:

Recruitment

15. How will potential subjects be identified for recruitment? (i.e. how will you select the schools, teachers, and students for recruitment)

Faculty self-select to use the system for classroom management of teamwork and have the choice to release data to the researchers after personally identifiable data have been removed.

16. Describe your relationship with the population you wish to study. (i.e. are you the teacher, principal, a graduate assistant, a fellow student, or clarify if you have not had prior contact with this group, etc.)

The research team provides teamwork management services free of charge for faculty.

17. Describe with whom (i.e. graduate student) and how (i.e. in a classroom setting, by mail, e-mail, etc.) you will make initial contact with the subjects.

The research team never contacts with the subjects directly. As part of its functioning, the online system sends students emails with instructions to complete surveys online, but students do not reply to these messages.

Attach a copy of any and all recruitment materials to be used (i.e. advertisements, bulletin board notices, e-mails, letters, phone scripts, or URLs).

Confidentiality

18. Will the data be collected anonymously (without identifiers)?
☐ YES. Skip to end of document.
X NO. Describe the identifiers to be collected:

4
In the online system, students have an identifier that is assigned by faculty and student email addresses are included.

19. Describe provisions that will be taken to maintain confidentiality of data (i.e. surveys, audio, video, etc.):

The research team does not have access to this data, which is stored on a server behind Purdue’s firewall and maintained by Hal Pomeranz of Deer Run Associates, a nationally recognized computer security expert. Internal IDs are assigned to student data for tracking purposes, but researchers do not have the ability to connect that tracking ID to any personally identifiable information. When student grades are reported, the faculty member teaching the class will be responsible for associating the grades with the tracking IDs so that researchers never handle personally identifiable information.

20. Estimate how long it will take to transcribe audio and/or video tapes and when they will be destroyed.

No audio or video tapes are being collected.

21. Will the PI be able to identify subjects (i.e. identifiers, code keys, etc.)?

X YES

□ NO

22. Will identifiable data be made available to anyone other than the PI?

X YES

□ NO

If yes, explain who and why they will have access to the identifiable data:

As indicated above, the tracking IDs are not associated with any personally identifiable information. They are used to track student team performance over time, but without regard to their identity.

As Principal Investigator of this study, I assure the IRB that the following statements are true: I have read the Human Subjects “Research Exemption Request Guidelines.” The information provided on this form is correct. I will seek and obtain prior written approval from the IRB for any substantive modification in the protocol, including changes in procedures, research team members, funding agencies, etc. I will not begin my research until I have received written notification of final IRB exemption. I will comply with all IRB requests to report on the status of the study. I will maintain records of this research according to IRB guidelines.

[Signature]

February 9, 2009

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Submit the original request to: Institutional Review Board (IRB), 610 Purdue Mall, Hovde Hall, Room 300