Academic Resources and Computing Committee

Proposal for Funding
Due Thursday, April 1, 2004 (4:30 p.m.)

Project Title: Business Intelligence, Audit and Security (BIAS) Lab

Project Director: Jefferson T. Davis

Department(s): Accounting & IS&T

College(s): Goddard School of Business and Economics

E-Mail: jtdavis@weber.edu          Extension: 6064

Other Members of the Project Team: Jim Swearingen, Steve Thorsted, Taowen Le, Matt Mouritsen

Instructions:
1. Please complete each section in the space provided. The justification section should not exceed two single-spaced typed pages. (An addendum may be attached describing details of specific hardware and/or software that are requested with this proposal.)
2. You are required to obtain the signature of an ARCC representative for your college, indicating that she/he is familiar with the proposal, and can speak to it during funding deliberations.
3. Your department chair’s signature is also required, indicating that she/he supports the proposal, and that the proposal is in keeping with departmental goals related to information technology and its applications to the academic mission of the institution. Your Chair’s signature also indicates her/his commitment to help support the project financially if so indicated on the budget page.
4. Your dean’s signature is also required, indicating that she/he has read and supports the project. Your dean’s signature also indicates her/his commitment to help support the project financially if so indicated on the budget page.
5. Your college’s computer committee must rank the proposal, and the committee chair’s signature is required.
6. For certain projects an IT expert’s signature is required. You must contact the appropriate individual if you are implementing a wireless network, multimedia classroom, software/hardware purchase that will require use of a campus server or work with online course software like WebCT Vista or ChiTester. You must give time before the deadline - the recommendation is 3 weeks - for that person to do an evaluation.
7. Submit one copy of the proposal, together with all relevant signatures, by 4:30 p.m., Thursday, April 1, 2004. NOTE: the ARCC no longer requires seventeen copies.
8. You must both email a soft copy and mail a hard copy of the proposal to the chair, David Ferro, MC 2401.
ARCC Representative:
I have read the proposal and discussed it with the Project Director.

__________________
ARCC Representative

Comments:

Department Chair:
The Department has reviewed this project within the context of overall information technology planning within the Department. If the budget page indicates financial support from the Department, I agree to commit those funds to this project.

__________________
Department Chair

Comments:

College Dean:
I have reviewed this project. If the budget page indicates financial support from the College, I agree to commit those funds to this project.

__________________
College Dean

Comments:

College Computer Committee Chair:
This proposed project has been reviewed and discussed by our college’s computer committee. It is the consensus of the committee that this proposed project is consistent with information technology goals within the college. Furthermore, after ranking all of the proposals submitted by our college, we rank this proposal in priority as

_____________ out of a total of ____________ proposals submitted this year.*

*Note: Each proposal must be given a separate ranking; no two proposals may receive the same rank.

__________________
College Computer Committee Chair

Comments:
IT Representative:

For certain projects an IT expert's signature is required. You must contact the appropriate individual if you are implementing a

**WIRELESS NETWORK** (contact Brook Chase at bhchase@weber.edu or x7192),
**MULTIMEDIA CLASSROOM** (contact Bob King at rking@weber.edu or x6865),
**CERTAIN SOFTWARE/HARDWARE** purchases that will require use of a campus server or work with online course software like WebCT Vista or ChiTester (contact Ted McGrath at tmcgrath@weber.edu or x7196).

I have read the proposal and discussed it with the Project Director.

_______________________________
IT Representative (printed and signed)

Comments (including status):
Justification

Your proposed project should be described as clearly and succinctly as possible in the spaces provided below. Be sure to review the “Criteria for Funding” document. The entire justification section should not exceed two single-spaced pages.

Abstract (project summary):
The Business Intelligence Systems, Audit, and Security (BIAS) Lab will be a computer lab where students, faculty, staff, and business professionals learn and apply advanced data extraction, manipulation, analysis, investigation, and security principles and procedures on business data. The lab would simulate the Information System of a Business Entity including audit and security features. The software is mostly available using current or donated academic licenses. The core information system would use Oracle and MS SQL databases and a middle tier Enterprise Resource Planning System (Great Plains) which are free for academic licenses (see Appendix C for a proposed list of software.) The hardware would include at least 12 workstations, a Sun Solaris server for Unix based software products and a Microsoft server for Microsoft Windows Based products. The lab would also include a projector for class presentations and a middle range printer and scanner. We intend to use Wattis 223 near the department secretaries’ offices so that School of Business and Economics secretaries could provide access for approved students outside of class times. According to Ron Mano, Accounting Department Chair, the room would be available to use as a lab. We would also link the computers in Wattis 120 to the two Lab servers, so that larger groups could have access to the software when an instructor is present in the Wattis 120 computer classroom lab.

The goal is to set up a “virtual business lab.” The business world mostly uses databases to store, manipulate and report information necessary for making business decisions. Managers, owners, investors, creditors, auditors, each have unique perspectives in analyzing the data of an entity based on the different types of decisions each user needs to make. In years past, obtaining data from the computer took a long time, but with modern open database architectures, data extraction is much quicker. However, users need to know how to use the software and proper techniques for obtaining the relevant data necessary for their decisions. Once the data is obtained, analysis of what the data really means is important. Software designed for manipulation and interpretation, as well learning and applying proper techniques for appropriate manipulation and interpretation are essential if the decision maker is to use the information for a proper decision process.

Objectives and goals of this project:

Education: Provide an advanced lab with the latest business and analysis software where faculty, students, and professionals can learn how to move data to and from several different business data systems. The lab will also help faculty, students and professionals learn how to use software and data analysis techniques to provide interpretation and reporting of business information for decision makers.

Research: Provide the faculty of the GSBE with an advanced lab with the latest business and analysis software to carry out research in the business and economics arena. For example the lab could be used to conduct economic choice experiments, simulate an IT or financial audit, develop logistical or marketing models.

Community: Provide an advanced lab where professionals could learn and apply (enhance) their data extraction, manipulation, analysis, and interpretation skills. The lab would be used for continuing professional education courses and seminars and would also provide a way for faculty and students to interact with the professionals.
Identify specific courses and/or programs that will directly benefit from this project:

(You may also want to describe how specific courses may be enhanced by this project.)

The educational, research and community objectives will be met through hands-on computer access by students, faculty, and community professionals to database, data extraction, data analysis, and reporting software. Users will be able to transfer data from underlying databases (e.g. Oracle, MS SQL) and business transaction software (e.g. Great Plains) to business analysis software. Current and potentially new courses in the School of Accountancy, IS&T and other courses in the GSBE can be taught in the lab. Current courses that could benefit from the lab include but are not limited to:

- Accounting Information systems (Acctg 3750)
- Auditing (Acctg 4510)
- Cost Accounting (Acctg 3300)
- Information Technology for Business (IS&T 3110)
- Database Design and Implementation (IS&T 3210)
- E-Business Infrastructure & Web Development (IS&T 3500)
- Audit Cases and Techniques (MPACC 6550)
- Internal Audit (MPACC 6580)
- Databases & Information Systems (MPACC/IS&T 6620)
- Information Systems Auditing (MPACC 6570)
- Advanced Cost Accounting (MPACC 6310)

Potential New courses would include Forensic Accounting and Fraud, Advanced Information Systems Auditing.

If applicable, describe how this project will help to increase faculty productivity or enhance competency in some area of information technology.

(Please note that ARCC does not support faculty desktop or laptop computers.)

Faculty can use the lab resources for practicing their computer skills and for data extraction, manipulation and interpretation necessary for research projects and for teaching courses. Finally continuing education classes can use the lab to provide a community service for professionals. We also envision faculty from all the GSBE having access to the lab and may provide software for the lab for their teaching and research needs.

Describe how the success of this project will be evaluated.

(If reports or publications are anticipated from this project, please indicate such.)

Our plan for evaluating the project would include recording the number of courses both regular curriculum and continuing education courses that use the lab. We would also use a sign in sheet for users that take advantage of the lab during nonclass times. This information would be available on an ongoing basis.

Timeline:

(If funded, when will this project be implemented?)

The BIAS Lab would be placed in operation during the spring and summer of 2004 and would be ready for operation for classes by Fall 2004. Some limited use would likely be available during the summer of 2004. We envision this lab as an ongoing lab. Most of the software is already available, and we will
seek for future grants or donations to obtain the latest software for data storage, processing, control, and analysis. Members of the project team would administer the lab in terms of accounts, software updates, etc., with Jeff Davis as lead and with any assistance and consultation available from the GSBE computer specialist.
Budget
Note: Please be as specific as possible regarding requested hardware, software, or other resources (you may include an addendum to describe the hardware). If funds are being committed from other resources, please so indicate.

<table>
<thead>
<tr>
<th>Hardware:</th>
<th>ARCC (Requested)</th>
<th>Department (Committed)</th>
<th>College (Committed)</th>
<th>Other (Committed)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sun Unix Server</td>
<td>$5,000</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Windows Server, 12 workstations, Ovhd Proj.</td>
<td>$10,061</td>
<td></td>
<td>$14,000</td>
<td></td>
</tr>
<tr>
<td>Printer Scanner</td>
<td>$650</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Wireless Node upgrade to G</td>
<td>$150</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hardware Subtotals:</td>
<td>$10,861</td>
<td>$5,000</td>
<td>$14,000</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Software:</th>
<th>ARCC (Requested)</th>
<th>Department (Committed)</th>
<th>College (Committed)</th>
<th>Other (Committed)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Various Software (See Appendix C for donated academic licenses from Grant Thornton, ACL and Microsoft)</td>
<td></td>
<td></td>
<td>$10,000 Conservative estimate</td>
<td></td>
</tr>
<tr>
<td>Software License for Doc. Image Scanning 500/mo.</td>
<td>$1,000</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>13 Windows XP Licenses ($51.37 each)</td>
<td>$668</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>13 Office Suite Licenses ($48.84 each)</td>
<td>$635</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Software Subtotals:</td>
<td>$2,303</td>
<td></td>
<td></td>
<td>$10,000</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Other:</th>
<th>ARCC (Requested)</th>
<th>Department (Committed)</th>
<th>College (Committed)</th>
<th>Other (Committed)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Swipe Card entry system (in addition to key lock)</td>
<td>$500</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6 Computer work tables ($279.62 each)</td>
<td>$1,678</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Other Subtotals:</td>
<td>$2,178</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Grand Totals:

\[\begin{array}{cccc}
\text{Product} & \text{Contract} & \text{CDW} & \text{Mfg Part #} \\
\hline
\text{InFocus LP530 Projector} & \text{Utah Pc Store Ma-1448 Contract} & \text{299838} & \text{LP530} \\
\text{ServiceNet 3 Year LCD Projector} & \text{Utah Pc Store Ma-1448 Contract} & \text{496427} & \text{3CWL C2} \\
\text{Samsonite Universal Projector Shoulder Case} & \text{Utah Pc Store Ma-1448 Contract} & \text{323035} & \text{931185} \\
\text{HP ProLiant ML330 G3 tower server} & \text{Government Back End} & \text{527967} & \text{348294-001} \\
\text{Compaq CarePaq 3 Year On Site} & \text{Government Back} & \text{276746} & \text{16267} \\
\end{array}\]

TOTAL FOR PROJECT: $44,342

Additional Resources

Please describe what other resources will be required to implement this project:

(Additional resources may include needs such as Academic Computing technical support or hardware installation through Electronic Services.)

We will need help to install and set up the wireless node. The physical ports are available for the Unix and the Windows server machine, so we only need to set these machines up as servers on the University network. We will also need to install an additional lock security for the door to enter the lab.

APPENDIX A: Budget narrative.

The quote from CDW-G details what specific hardware would be purchased. We will begin the lab with the software that we already have educational licenses for and that have been donated by companies and firms. The Sun Server was purchased a year and a half ago and has Unix already running.

APPENDIX B: Other grant support.

The Unix based Sun server was purchased by funds from the Accounting and IS&T departments and grant money from Dr. Taowen Le. It is difficult to put an estimated value on the donated and free academic licenses. We used a very conservative estimate of $10,000. For example, Grant Thornton’s complete audit package is not sold on the open market. When Jeff Davis approached the Big 4 Accounting firms for their complete audit packages, only one firm said yes, but the cost would be $20,000.

We also hope to be able to continue lab funding for when we need to replace computers in the future by obtaining revenue from teaching continuing education courses to professionals and from donations from other sources.

APPENDIX C: Supporting documentation

We have attached the quotes from CDW-G.
Software List (not necessarily complete) we hope to make available in the lab. The estimate of $10,000 value for software already available is very conservative.

**Operating Systems**

Unix Operating System (Already have academic license)
MS-Windows Operating System (XP, need to purchase 13 licenses at 51.37 each)
Novell Network System (University License)

**Basic Business Packages**

MS-Office Professional Suite (Need to purchase 13 licenses at $48.84 each)
Great Plains Accounting Software (Free academic License from Microsoft)
Peachtree Accounting (Already have academic license)

**Database**

MS-Access (Part of MS-Office Suite)
MS-SQL (Free academic License from Microsoft)
Oracle 8 (University already has license and has already been in use)

**Data Extraction, Manipulation, and Analysis Software**

ACL (Free academic License already obtained)
NeuralWare Neural Network Software Academic License already obtained by Jeff Davis)
Other statistical packages (Weber State already has several licenses)
Crystal Reports (Have not approached Crystal reports yet)
**Audit Software**

Infocus (Internal controls evaluation software already provided by Grant Thornton)
Explorer (Audit Procedures Software already provided by Grant Thornton)
CBEAM (Audit Workpaper software already provided by Grant Thornton)

**Document Imaging**

Worlddox, Fort Dox, etc. (Would approach these vendors and find one that would provide academic licenses free)
License to scan and digitize documents ($1,000 one time purchase)