Interactive Repository for Educational Software

Graduate Project

By

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http://www.sci.tamucc.edu/~y0l81064/graduate
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Yali Lei

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Dr. M. Guimaraes, , Chairman of Committee

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Dr. D. Thomas, , Member of Committee
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Documents of Project
Interactive Repository For Educational Software

( IRES )

ABSTRACT

The purpose of this project is to develop an interactive Web-database tool on the World Wide Web to disseminate and collect educational software. A search engine that includes several subjects is designed for fast searching. A Web-database system that combines the feature of SQL, PL/SQL, JavaScript with HTML is designed to collect and distribute educational software as well as to provide instruction in selected areas. Several dynamic windows, evaluation pages, download pages, query pages and an education BBS are included in the design to display information to the user of the system.
Background and Rationale

The increasing utilization of resources available via the internet is attracting people worldwide. The Web is a world-wide repository of information. This technology offers opportunities to communicate from long distances and at speeds that did not exist only a few years ago. A multi-media medium such as the World Wide Web (WWW) can be designed to allow users to access to information using paths that reflect and support their own associative thinking process. There are three primary functions of the web: communication (the ability to communicate with other schools and communities), information access (the ability to access and use information,) and resource sharing (the ability to share and publish information resources for others to access and use.) The use of a system like the World Wide Web will forever change the manner in which technologically advanced societies live and operate. Like a child turning a kaleidoscope to discover and examine every changing pattern, users turn a 'page' on the Web to discover and examine the world at large. Using the Web as a tool for communication, teachers can share lesson plans and curricula, students can work collaboratively on research projects with experts and peers from all corners of the globe. Parents can access course information on a day-to-day basis. Using the Web as a tool for information access, an individual user can connect to comprehensive library collections. Using the Web as a tool for the sharing of resources, educators can post online guides for specific topics and get feedback on their online projects. Adding an easy-to-use point and an incredibly simple mark-up language for document development, the Web becomes an

<< 2 >>
appealing tool for student-centered research and discovery.

Educators are excited about the new technology and are searching for ways to incorporate the power of the Web into curricular areas. A number of research-grounded Web-based courses and course development tools have already demonstrated several advanced features:

- interactivity ---- the possibility to explore the domain
- communication and collaboration --- the possibility to discuss course-related issues with the teachers.
- assessment --- the possibility to take tests or get feedback on an assignment.
- adaptively --- the possibility to serve different 'pages' and links in the same context to users with differing abilities, Web experience, knowledge and backgrounds.

Considering that most Web-based applications are to be used by a much wider variety of users than stand-alone applications and in many cases, the user is working alone with a Web application (probably from home), educators design a variety of educational software for the Web. A growing number of collaborative groups involving classroom teachers, cognitive researchers, technology experts, psychologists, and natural scientists are joining together to improve science education by using this new technology. They use different tools, platforms, languages, and database systems to design and develop the educational software. Because users do not know where the tools exist or how to incorporate the tools into their curriculum, and because few educational repository

<< 3 >>
systems exist for World Wide Web, it is difficult for users to communicate and share information with each other. This results in educational software not being widely used today. Therefore, how Web-based educational software can be used effectively in education and training, how the benefit of the Web can be of better service to the users, how the user can be allowed to focus on specific subject matter rather than devoting time and energy to Web navigation, have become important subjects to be studied.

With this Web-database interface internet system, everything will become so convenient in educational software applications. There are several expected benefits:

Interactive Repository For Educational Software (IRES) will make full use of comical educational software.

IRES will be a helpful model of Web-based education collection

IRES users will spend less time searching and get better benefits from this system. With this design, Web-based learning will become the real 'Web-based learning' base, because everyone in the world with access to the Web can choose easily learning materials or tools from a certain area of interest. Doubtless, it is valuable to spread cultural and scientific knowledge among people.
Narrative

The objective of this project is to build an educational software database using a commercial relational database system (Oracle 8.0.5,) and to develop a Web-interface system between the database and the World Wide Web using Oracle WebServer. A search engine that combines the PL/SQL with HTML is to be designed to access the system conveniently. This system allow authorized users to query system database directly on the Web Sites by using the standard SQL language. It is easy to use even if user is not familiar with SQL language. The system also provide evaluation, a BBS and download information that stored in system database for user. The design and development of a Web-database deliver Web front ends for their application and also improve the efficiency of use of educational software. To reach these points, the project include following utility:

Security Utility
Search Engine Utility
Query Utility
Author Database
Submit Software Utility
BBS Utility
Help Guide

Security Utility
The user who want to query (see figure n-4) the system database has to access this utility. Otherwise, just skip this utility. When users access this utility, they are prompted

<<5>>
to fill in their name and password (see figure n-1). The form is sent to a CGI program written in PL/SQL language after the user submits it. Following is the outlook of its interface page.

You have reached the query database utility. Please enter your name and password.

User Name:

Password:

Figure n-1: password form

Search Utility

This utility is public, thus no password is required. In this utility, several evaluation and download information are provided so that user has the outline of each category and further his/her search. The user can download any software that is stored in the system database by clicking the related download symbol. A user can dynamically choose category or subject which exist in the system database.

Please choose any you interesting category or education or both.

select a Category: (none)  select a Subject: (none)

Submit

Figure n-2: Search Form

<< 6 >>
The user can choose any category or subject or both in order to view or download the
Related software. The user can dynamic choose the software by selecting different
Category or subject that is stored in the system. Because the interface program use the
Variable called weblink related with the cursor which function is to execute dynamic
selection from the database system. When the user choose different item, the web display
difference interface page for user (see figure n-3).

**Category computer science: education**

<table>
<thead>
<tr>
<th>Details</th>
<th>ID</th>
<th>Category Name</th>
<th>Subject Name</th>
<th>Web Link</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2000</td>
<td>computer science</td>
<td>Music NUM</td>
<td><a href="http://www.forsch.uni-erlangen.de/~kindermann/index.htm">http://www.forsch.uni-erlangen.de/~kindermann/index.htm</a></td>
</tr>
<tr>
<td></td>
<td>2001</td>
<td>computer science</td>
<td>SupaStat</td>
<td><a href="http://www.anglia.co.uk/education/mathsnet/index.htm">http://www.anglia.co.uk/education/mathsnet/index.htm</a></td>
</tr>
</tbody>
</table>

**Figure n-3: Link & Download Form**

**Query Utility**

This utility enables authorized users to query the system database directly on the Web
page. This utility is designed according to the format of the database which is made by
Oracle 8.0.5 (relational database management system).

The user can easily switch to the difference tables which exist in system database by
clicking the drop-down box and further query these table by choosing the different
buttons displayed on the page (see Figure n-4).

<< 7 >>
Choose a Table Name

You already reached the query part. Please feel free to execute your query.

Select a Table Name: [author_table]

View Button perform the function to descriptor the table. The user can view the contents of the table by clicking this button.

Select-form (Figure n-5): The user can specify any information for each table to view by clicking the check box which is located in the left side of the item. They can check one or more than one to view in the same time. If the user want to specify the search condition, he/she need fill in search condition form; If the user want to order his/her search result, he/she need specify the item he/she want to order by. Otherwise, the user only need click the check box and submit it.
wing text or choose select button directly. Otherwise go to bottom of the page to ge

Figure n-5: Select Form

Insert-Form (Figure n-6): The user can insert data directly to system database from the internet. If the user want to post his/her project on the IRES, he/she can use this form to enter data by choosing the subject table. The user also can use the submit form(in the main page) to submit his/her URL or more information to system database.

Figure n-6: Insert Form

Update-Form(figure n-7): The user can update data that existed in system database directly from the web page. It is easy to use for user if he/she follow the on-line help or he/she know the basic SQL language. The interface structure look like:

<< 9 >>
Delete-Form (Figure n-8): In this part, the user can easily move data from system for good by checking the check box related with row or rows.

<table>
<thead>
<tr>
<th>Check</th>
<th>Author Id</th>
<th>Couriseneumber</th>
<th>Author Name</th>
<th>Author Rank</th>
<th>Author Phone</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>987654321</td>
<td>1001</td>
<td>Rob Young</td>
<td>WebMaster</td>
<td>210-6574-188</td>
</tr>
<tr>
<td></td>
<td>123456789</td>
<td>1021</td>
<td>yali</td>
<td>Webteacher</td>
<td>512-993-6627</td>
</tr>
<tr>
<td></td>
<td>123450789</td>
<td>1023</td>
<td>Oliver</td>
<td>programer</td>
<td>617-2334-998</td>
</tr>
</tbody>
</table>

Figure n-8: Delete Form

The purpose of this utility is to make user easily use SQL language on Web Sites. The project reach the goal by creating different packages, functions and procedures that work on the Oracle Web Server.

Author Database
The purpose of this utility is to provide further detail information about the author so that the user can contact with them by E-mail or phone. A brief instruction is included to help the user to search fast. For the sake of dynamic access and convenience, this utility work on a Javascript program. It use the feature of window and alert created by Javascript program (see Figure n-9).
Author Information Database

Select the letter for which you would like to look up listed people.

Do you like it? Try it.

Instructions: Simply "click the letter of the first initial of the last name of the person desired. Then "click" the Find button.

Find:

Figure n-9: Author Database

Submit Software Utility
This utility is designed to encourage the users to submit their projects to expand the system database. Then system can post it to its web sites. It work on the PL/SQL programs. the input information will be validated by the JavaScript program. The information that user submit will be transferred to the system file automatically.

If user specify his/her return E-mail address, the information also will be sent to his/her mail box automatically.

BBS Utility

This utility is designed to build a standard alone system for education software. It work on the JavaScript and PL/SQL programs. This is new explore for the author. The two kinds of BBS exist on the Web Sites today. This one is Web-based BBS. It main goal is to provide the place for user to post his/her message, view the information, download information and chat each other. This utility links with many related Web Pages to make user search quickly (see Figure n-10).

<<11>>
Description of Options

Home: This return you to the Home Page from other Education Bulletin Board Service (EBBS).

About: The "About" page provides a brief description of EBBS List along with background information.

Links: Hot link is a collection of education links to other Web Sites I enjoy, and you may too.

Comments: This is Guest Book for your comments.

Figure n-10: EBBS front Page

Help Guide

This guide explains to users how to use this system to search their materials rapidly.

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Project Environment

JavaScript

is used for input data validation and page design. It is also used to enhance interactive and dynamic page activities.

PL/SQL

Common Gateway Interface (CGI) written in PL/SQL is used to query and access an Oracle database from various environments.

Hypertext Makeup Language (HTML)

is used to present the information forms and display the information. It is also used to embed JavaScript procedures and interface with PL/SQL and CGI routines.

This interface system will run on any Java-capable Web browser, such as Microsoft Internet Explorer 3.0 or Netscape Navigator 2.0 or later. The Oracle 7.0 relational database system and Oracle Web Server installed on the UNIX Server running HTTP protocol is required to run this system.

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Procedure

The procedure of this project includes the following parts:

Design of Author Database  Design of Search Engine  Design of Submit Form
Design of Query form

Design of Flow Diagram (figure 1)

---

**Figure 1: System Flow Chart**

The flow chart in Figure 1 is presented as an overview for this project. Users can access the educational software database by using PL/SQL programs for their searching.

This design uses JavaScript, PL/SQL, SQL and HTML as the key programming languages. JavaScript is used to enhance the dynamic and interactive features of the Web site by performing check forms, add special effects, write interactive programs, and

<< 14 >>
validate the input data. HTML (HyperText MarkUp Language) is used to embed JavaScript in its header and display all information for users. PL/SQL (HTP and HTF) is used to write the Common Gateway Interface (CGI). The HTML output generated by a PL/SQL procedure is sent from the Oracle 7 Server to the Oracle Web Agent. The output is then passed on to the Oracle Web Listener. The Web Listener sends the generated HTML document back the Web user.

**Design of Database** (figure 2)

The design of system database is based on the Oracle Relational Database. The all data of the project come from the database. In the design of database, Some constraints are added to protect the table and avoid the cascade deletion. Following is a detailed description of the educational software database.

---

Figure 2: E-R Diagram

<< 15 >>
Category

This table uses C-Id(Category ID) as the primary key and contains other attributes as shown.

c_id
   Constraint pk#c_id $category primary key

_c-name
   Constraint nn#c_name$category not null

_c_domain

Subject

This table contains the unique_subject_id, softwareName, lectureHours and other attributes as shown.

unique_subject_id
   Constraint pk#unsubject $subject primary key

_c-name
   Constraint fk#c_name$subject references category on delete cascade

aid
   Constraint fk#aid $subject references author

sName

sApplication

description

Weblinks

download

level

<< 16 >>
WorkON

This is join table of tool and subject software. It contains the information about how to use the software.

unique_subject_id
tid
   Constraint pk# unsubject.tid $workon
   primary key(unique_subject-id, tid)

Constraint fk# unsubject $workon references subject
Constraint fk#tid $workon references tools

tools

This table identifies and describes briefly some tools for educational software.
tid
   Constraint pk#tid $tools primary key

NameOfTool
tMethod
tdescription

author

This table includes some information about author.
aid
   Constraints pk#aid $author primary key
aname
aphone
ae_mail

Design of Search Engine

This category & subject are designed for users to choose their software conveniently.
For the sake of dynamic and interactive capabilities, it combines PL/SQL with JavaScript to perform the input and output actions. The following is a flow chart (Figure 3) of this part.

**Figure 3: Flow Chart for Search Engine**

In this part, the key languages are PL/SQL, JavaScript and HTML. The PL/SQL language is provided by Oracle Web Agent which integrates the Oracle 7 Server and the World Wide Web and provides transparent access to Oracle7 directly from the WWW. The
Oracle Web Agent is a CGI program that the Web listener executes when a request is received for a dynamic document. This program logs into the database and executes stored PL/SQL procedures that have been specified as part of the URL.

Since the JavaScript is run on the client computer, it can share the burden of the server and prevent accidental access by some Internet travelers out of the server. The result is that the efficiency of this system can be improved. After a user chooses category or category and subject, the brief information or detail information will be displayed for user.

**Design of query form** (figure 4)

This part is designed for authorized uses. The authorized user can access this part with queries to the system database. PL/SQL is used to access the system database. It integrate with the database server so that the PL/SQL code can be processed quickly and efficiently. Additionally, Oracle’s Web Server allows a PL/SQL stored procedure to generate an HTML page. Thus, dynamic Web pages, based on both user input and database information, can be created.

Following is its operational flow chart:
Figure 4: Flow Chart for Query Form

Input for insert form:

All data items that are displayed on the insert form.

Output for insert form:

The data will be added into system database and feedback will be displayed on screen to indicate a successful insert, or a message will be displayed on the screen to warn that an illegal insert was attempted.

<< 20 >>
Input for update form:

First, the rows of selected table that will be updated from select menus is specified. Second, the update form is filled according to the standard SQL language.

Output for update form:

The data that have been updated will be transferred into the system database and feedback will also be displayed on the screen to indicate a successful update, or a message will be displayed on the screen warning that an illegal update was attempted.

Input or select for delete form:

An item that you want to delete from the select menus is chosen following the instructions provided.

Output for delete form

The data will be removed from system database and feedback will be displayed on the screen to indicate a successful delete, or a message will be displayed to warn that an illegal delete was attempted.

Design of author database (figure 5)

This part is designed to search further for information about authors of educational software that is collected in this project so that user contact with them. This utility is implemented by the JavaScript program. An online help that is located beside the letter table, theches the user how to use it.

It functions as shown in the following flowchart:
Figure 5: Flow Chart for Author Base

Input:

The letter button for the first letter of the author's last name on the letter table is selected.

Output:

Information about the author is displayed on a new window corresponding to the input that the users submit.

Design of Submit Form (figure 6)

This part will be implemented with CGI written in PL/SQL program. User need fill in some personal information in this submit form. The purpose of this utility is to collect the educational software and expand the system database.
Figure 6: Flow Chart for Submit Form

The user fills in this form, and a CGI program implements the form. After the contents of this form is validated, the content of this form is displayed when user select the submit button.

Input:

Register Section
	Name
	E-mailAddress
	Homepage URL

Educational software information Section
	Software Name
	Software URL
	Description of Software

Output:

The contents of form that the user submits will be displayed as acknowledgement.

<< 23 >>
Design of Security Utility

The purpose of this part is to protect the system. The process is shown in Figure 7.

![Diagram](image)

**Figure 7: Flow Chart for Security Utility**

This utility is implemented by a CGI written in PL/SQL program. The user name and password are validated by this program and then a report will be sent back to the Web Browser.

**Input:**

password (system definition)

**Output:**

'Incorrect, try again!' message will be displayed when user fills in an incorrect password.

Or

'Welcome!' message will be displayed when the user fills in the correct password.
Prospective Results

This project provides user a interface system to integrate database application through the World Wide Web with some security features. The user can select dynamic data from the system database and view different relevant information on the internet. The authorized users can access this system with queries to the system database. As a Web-database interface system it will include:

A complete database design which run under Oracle 7.3 for this project.

A complete software package that contains all JavaScript programs, HTML documents, and PL/SQL code for this project.

Several window designs for users for the sake of convenience.

A test result using system database data of this project.

A security system design for the query form part.

The graduate project report as final documentation.

<< 25 >>
References

1. Database, Patrick O'Neil,

2. Oracle PL/SQL programming, Scott Urman,
   Mcgraw-Hill, Inc, Berkeley, CA, 1996

3. Oracle Databases on the Web, Robert Papaj & Donald Burleson,
   The Coriolis Group, Inc, Scottsdale, AZ, 1997

4. "Oracle WebServer",
   Web site http://robin.tamucc.edu:8888

5. Introduction to CGI/Perl, Steven E.Brenner & Edwin Aoki,

6. Instant Web Scripts with CGI/Perl, Selena Sol & Gunther Birznieks,

7. JavaScript 1.1,
   Sams.net publishing, 1996.

8. JavaScript, Kevin Ready & Paulvachier,

9. Perl 5 How-to, Mike Glover, Aidan Humphreys, Ed Weiss,
   The Waite Group, Inc, Corte Madera, CA, 1996

<< 26 >>
Main Output of Implementation
Welcome to IRES

IRES, Interactive Repository for Educational Software, is Web-database interface internet system. It combines the features of PL/SQL (Web Server), JavaScript with HTML to design an interactive system on the internet to collect and distribute educational software.

This system includes the following utilities:

- **Category**
- **Select Subject**
- **My BBS**
- **Author Utility**
- **Query Database System**
- **Online Help**
- **Submit Utility**

<< 27 >>
## C A T E G O R Y

### category table view

<table>
<thead>
<tr>
<th>category ID</th>
<th>Category Title</th>
<th>Description</th>
<th>Subjects</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Computer Science</td>
<td>This category introduces some basic technology about Web-date, Javascript program, graphic and CGI in the educational application. These software combines easy-to-learn software tools with a comprehensive set activities designed to help middle school student and people who are no program background understand the fundamentals of computer science. The category includes the different field in computer science. Each offers a unique and easy way for student to learn.</td>
<td>JavaScript</td>
</tr>
<tr>
<td>2</td>
<td>JavaScript</td>
<td>This category includes many basic features about Javascript. It will take students step by step through the fundamentals of Javascript and create their own HTML pages. It provide a easy way to learn how to write functions, use data from boxes, create IF- THEN conditional program loops and generally make student's Web page &quot;smarter&quot;. It can be used in classroom for 12th to dault.</td>
<td>HTML TOOLS</td>
</tr>
</tbody>
</table>

<<28>>
<table>
<thead>
<tr>
<th>3</th>
<th>Basic PC</th>
<th>This category includes same basic PC application in educational software. These educational software can be used in conjunction with any beginning MATH, SCIENCE, COMPUTER curriculum in the classroom, in computer lab or at home. With these software, students will master MATH, SCIENCE faster than normal.</th>
<th>Math Path</th>
</tr>
</thead>
<tbody>
<tr>
<td>4</td>
<td>Chemistry</td>
<td>This category includes a few of example to demonstrate the chemical experiments.</td>
<td>Acid Base Titration</td>
</tr>
<tr>
<td>5</td>
<td>Early Education</td>
<td>This category includes many education softwares in early education system. These educational software come from TAMUCC early education research center. You will find much more information, such as CD-ROM, prices and detail description about these software porpurse in this category.</td>
<td>Organizing Classroom</td>
</tr>
</tbody>
</table>
Title: Computer Science on the internet

**Edition:** 2nd edition

<table>
<thead>
<tr>
<th>Media: internet resource</th>
<th>1998</th>
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<tr>
<td><strong>IRES#: IRES-199803</strong></td>
<td></td>
</tr>
<tr>
<td><strong>Subject:</strong> computer science, computer used in education, graphic, Javascript program, Web-data, Oracle WebServer, PL/SQL, CGI</td>
<td></td>
</tr>
<tr>
<td><strong>Grade:</strong> 10,11,12,c level</td>
<td></td>
</tr>
<tr>
<td><strong>Language:</strong> English</td>
<td></td>
</tr>
<tr>
<td><strong>Audience:</strong></td>
<td></td>
</tr>
<tr>
<td><strong>Publisher:</strong> American computer resource, Inc.</td>
<td></td>
</tr>
</tbody>
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---

### Abstract

**Abstract:** These educational software intruduct some computer technology for high school and college level. These sites combines easy-to-learn computer tools with a comprehensive set activities designed to help beginner and people who are not program background understand fundamentals of computer science and make their own program in Javascript, CGI, HTML and more... These sites also links to similar filed in internet.

---

### Vendor Information

**Internet**

<table>
<thead>
<tr>
<th>description</th>
<th>Cost</th>
<th>OP system</th>
<th>order#</th>
</tr>
</thead>
<tbody>
<tr>
<td>internet resource</td>
<td>Free</td>
<td>window 95, 3.1</td>
<td></td>
</tr>
</tbody>
</table>

**Online address:** [http://www.studyweb.com](http://www.studyweb.com)

<< 30 >>
Evaluation Information

**Standards:** Not currently available

Content Description

**Material Type:** GIF images, World wide Web (WWW) resource

Donor

Internet

Index

**Personal Name:**

**Corporate Name:** American Computer Resources, Inc.

Table of Contents

**Subject Name:**
- computer science
- Javascript
- Web-Data
- CGI
- Oracle WebServer
- PL/SQL
- Internet

<< 31 >>
Welcome!
And thanks for stopping by!

Title: Javascript on the internet

Edition: 2nd edition
Media: internet resource
IRES#: IRES-199805
Series: Subject: Alert, windows, colors, cooks
Author:
1998
Language: English
Audience:

Abstract

Abstract: Javascript is an easy-to-use programming language that can be embedded in the header of the Web page. It can enhance the dynamics and interactive-feature of your page by performing calculations, check forms, write interactive games, add special effects, customize graphics selections, create security password and more. These Web sites will take you step by step through the fundamentals of Javascript. You will learn how to write functions, use data from the text boxes, create IF-THEN conditions, program loops, and generally make your Web page "smarter". These are good for the total non-programmer.

Order Information

Vendor Information
Internet

description | Cost | OP System | order
internet resource | window NT, window 95, MacOS

Online address: http://165.95.14.67
http://www.claris.com/index.html
http://www2.tamycc.edu

Evaluation Information

Standards: Not currently available

Content Description

Material Type: World wide Web (WWW) resource, CD-ROM, Flappydisk(s), Video Ty

<< 32 >>
Index

Personal Name: Jody Erickson, Charles Duncan, Susan De Vaney

Corporate Name: TAMUCC-Early Childhood education center & Claris Corporation

Table of Contents

Subject Name:
Language Arts
Math
Graphic
Science
Teaching
Spdsht\Dbase
Welcome!
And thanks for stopping by!

Title: Basic PC on the internet

Edition: 2nd edition

Media: internet resource

IRES#: IRES-199802

Subject: educational technology, computer used in education, General education, Math, Science, Biological and life science

Grade: Kindergarten, 1,2,3,4,5,6,7,8,9,10,11,12

Language: English

Audience: Elementary School teaches, Middle school teachers Parents, Seco school teachers, Teachers.

Abstract:
These Web sites links users to kid friendly. Each week, these educational Web sites topic as diverse as gargoyles, inventors or the declaration of independence. A mathematics design to prove that mathematics can be fun. There are interactive activities for creating paths and exploring symmetry. Also found are links to similar sites.

Vendor Information
Internet

description | Cost | OP system | order#
--- | --- | --- | ---
internet ressource | Free | window 95, 3.1 | 

Online address: http://www.surfinetkids.com

Index

Personal Name: Feldman, Barbara J.

Corporate Name: ElectriCiti Internet Access.

Content Description

Material Type: World wide Web (WWW) resource, Article professinal guides.

Donor

Internet

<< 34 >>
<table>
<thead>
<tr>
<th>Subject Name:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Arts</td>
</tr>
<tr>
<td>music</td>
</tr>
<tr>
<td>Computer</td>
</tr>
<tr>
<td>Internet</td>
</tr>
<tr>
<td>Math</td>
</tr>
<tr>
<td>Science</td>
</tr>
<tr>
<td>History</td>
</tr>
<tr>
<td>Games &amp; Hobbies</td>
</tr>
</tbody>
</table>
Title: Chemistry on the internet

<table>
<thead>
<tr>
<th>Edition:</th>
<th>2nd edition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Media:</td>
<td>internet resource</td>
</tr>
<tr>
<td>IRES#:</td>
<td>IRES-199805</td>
</tr>
<tr>
<td>Series:</td>
<td></td>
</tr>
<tr>
<td>Publisher:</td>
<td>Tennessee State University, Academic Computing Department</td>
</tr>
<tr>
<td>Author:</td>
<td>Thomas, Gardner</td>
</tr>
<tr>
<td>Subject:</td>
<td>Acid base titration, Chemistry, periodic table, chemical properties, problem solving</td>
</tr>
<tr>
<td>Grade:</td>
<td>11,12 college, adult</td>
</tr>
<tr>
<td>Language:</td>
<td>Er</td>
</tr>
<tr>
<td>Audience:</td>
<td></td>
</tr>
</tbody>
</table>

**Abstract**

Abstract: These World Wide Web (WWW) sites are designed to provide educational so information on chemistry. From these Web sites, the end-user may select from the following chemistry & chemical education Resources, chemical education Resources, acid base titration of these links provides information on areas of concern within the chemistry discipline. Using resource, the user is able to link to other sites providing information on or access to chemistry indexes, chemistry software, chemistry search engine like yahoo, multimedia available for chemistry. They also provide online textbooks and problem solving example in general chemistry, organic chemistry and environmental chemistry as well as supplying information on additional web resource, useful tools and current topic in these subjects.
Vendor Information
Internet

description | Cost | OP system | order |
---|---|---|---|
internet resource | Free | windows 95, windows 3.1 |

Online address: http://acad.tmstate.edu/~chemnet

Evaluation Information

Standards: Not currently available

Content Description

Material Type: World wide Web (WWW) resource

Donor

Internet

Index

Personal Name: Gardner, Thomas

Corporate Name: Tennessee State University, Academic Computing Department

Table of Contents

Subject Name:
Acid base titration
problem solving
general chemistry
environmental chemistry
biochemistry
life chemistry

<< 37 >>
Author Information Database

Select the letter for which you would like to look up listed people.

Do you like it? Try it.

Instructions: Simply "click the letter of the first initial of the last name of the person desired. Then "click" the Find button.

Find

Web Online Help

View the Table

http://robin.tamu.edu:8890/apps/owa/lei.education.chooseSubject

View Education Database

Please choose any you interesting category or education or both.

select a Category (none) select a Subject (none)

Submit

category

<< 38 >>
Click putdown menu box to select a category and a subject name in second putdown menu box. Then click submit button to view detail information about your specified; You also can only select a subject and leave none in second putdown menu to view the outline about your specified category.

Note: In the first case, when your selection match with database data, you will view the feedback. Otherwise, you will got a message.

### Category computer science: education

<table>
<thead>
<tr>
<th>Details</th>
<th>ID Number</th>
<th>Category Name</th>
<th>Subject Name</th>
<th>Web Link</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2000</td>
<td>computer science</td>
<td>Music Num</td>
<td><a href="http://www.forwiss.uni-erlangen.de/~kinderma/">http://www.forwiss.uni-erlangen.de/~kinderma/</a></td>
</tr>
<tr>
<td></td>
<td>2001</td>
<td>computer science</td>
<td>SupaStat</td>
<td><a href="http://www.anglia.co.uk/education/mathsnet/inde">http://www.anglia.co.uk/education/mathsnet/inde</a></td>
</tr>
<tr>
<td></td>
<td>1011</td>
<td>computer science</td>
<td>graphics</td>
<td><a href="http://www.developer.com/community/person.cg">http://www.developer.com/community/person.cg</a></td>
</tr>
</tbody>
</table>

Click one or more check boxes in detail column. Then click the submit button to view the detail information for your specification.

<< 39 >>
You have reached the query database utility. Please enter your name and password:

User Name:

Password:

Fill in your name and password. If you want to reset data, click reset button. Otherwise, select submit button.

Choose a Table Name

You already reached the query part. Please feel free to execute your query:

Select a Table Name: [author_Table]

Select a table name from putdown box. Then you can click any button lactated below the box according to your requisition.
Select author Table

Check one or more columns you want to display from the author Table

<table>
<thead>
<tr>
<th>check box</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>AUTHOR_ID</td>
</tr>
<tr>
<td></td>
<td>COURSENUMBER</td>
</tr>
<tr>
<td></td>
<td>AUTHOR_NAME</td>
</tr>
<tr>
<td></td>
<td>AUTHOR_RANK</td>
</tr>
<tr>
<td></td>
<td>AUTHOR_PHONE</td>
</tr>
</tbody>
</table>

Click the row that you want to display in check box If you click the submit, you will display all data that indicate your select. If you want to select special row to display, you need use the SEARCH CONDITION boxes to specify your selection.

For Example: if you want to view author called 'yali' information, you need fill in look like:

```
author_Name='yali'
```

In the SEARCH CONDITION box. If you want to order you specify, you can fill in look like:

```
order by author_Name
```

```
order by author_Rank ... 
```
in the ORDER CONDITION box

NOTE: Don't forget the quotation around item that you species in SEARCH CONDITION.

**Insert** ----author Table

<table>
<thead>
<tr>
<th></th>
<th>AUTHOR_NAME</th>
<th>AUTHOR_RANK</th>
<th>AUTHOR</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

You have to fill in red color columns in the box. Otherwise, you will fail to submit your message.

Note: The number mean five digit length.

**Update** database

<table>
<thead>
<tr>
<th>Set Clause</th>
<th>Where (search cond)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Example of Enter Update Data:</td>
<td></td>
</tr>
<tr>
<td>AUTHOR_ID = digits, COURSENUMBER = 'value2'</td>
<td>AUTHOR_ID = digits and AUTHOR</td>
</tr>
</tbody>
</table>

<< 42 >>
Set the update data in the update box, then set the your condition (were you want to update in the table) in the WHERE box.

Note: When you fill in number, you just need fill the digits; when you fill in character, you need use quotation around them. You just need to select a semester from menu box. Then select submit button. The row that you specified will be removed from the database.

Note: Once you select the submit button, the row will be deleted from system database forever.

Delete ----author_Table

<table>
<thead>
<tr>
<th>Check</th>
<th>Author Id</th>
<th>Course Number</th>
<th>Author Name</th>
<th>Author Rank</th>
<th>Author Phone</th>
</tr>
</thead>
<tbody>
<tr>
<td>Γ</td>
<td>987654321</td>
<td>1001</td>
<td>Rob Young</td>
<td>WebMaster</td>
<td>210-6574-188</td>
</tr>
<tr>
<td>Γ</td>
<td>123456789</td>
<td>1021</td>
<td>yali</td>
<td>Webteacher</td>
<td>512-993-6627</td>
</tr>
<tr>
<td>Γ</td>
<td>123450789</td>
<td>1023</td>
<td>Oliver</td>
<td>programer</td>
<td>617-2334-998</td>
</tr>
</tbody>
</table>

You just need click the check box where indicate the row you want to removed from the database. Then click the delete button. The row will go forever.

Note: Once you select the submit button, the row will be deleted from system database forever.

<< 43 >>
Form Submission

Test results will be e-mailed to address provided.

Enter your name: 

Enter your e-mail address: y0181064@batman.tamu.rr.edu

Your browser (platform, country): Netscape 4.04 [en] (Win95; 

Enter your country:

Leave a comment or suggestion:

List your favorite sites:
A List of Education Bulletin Board Service

Editor: Yali lei

published by September, 1998
© copyright 1998 Yali Lei

Description of Options

Home  This return you to the Home Page from other Education Bulletin Board Service (EBBS).

About  The "About" page provides a brief description of EBBS List along with background information.

Links  Hot link is a collection of education links to other Web Sites I enjoy, and you may too.

Comments  This is Guest Book for your comments.

<< 45 >>
This is where my software library locate. It contains a brief description of each software by popping up a new window.

Download List 

Download list is a collection of some education software I like, and you may too.

My Project 

This is main place where my graduate project located

Chat Room 

This is nice place where you can chat with some people.

Education is our priority

Welcome to the Education Bulletin Board Service (EBBS), your Interactive Online Service Provider. EBBS is a Web-based Bulletin Board System. EBBS has been designed to provide you with information that you might need. It offers a interactive World, appealing to users of all ages, in special for educators.

"The goal of this site is to provide an online system packed with features and still be able to take the time to give some service in a friendly atmosphere"

What your seeing here and online, is the result of my work. Please be my guest and take a look around. If you have any question, please contact with

y0181064@batman.tamucc.edu

<< 46 >>
Education Software Library

The page provide a brief description of follow education software by post seperately them on a new window.

Online Learning Environment

- Children's Literature Web Guide
- The homespun Web of Home Educational Resources
- Education Software Repository
- Online Learning on Internet
- The Internet in the Classroom
- The future of Online learning
- New Technology in Education

- Personalized Education

Education for K - 12th on internet

- Educational gallery
- Ion Science
- Basic computer technique
- Science imgenation
- Interesting Mathematics in computer
- First grade book for teacher

How to create a Dynamic Web Page

- Graphic in chemistry application
- How to use JavaScript to decorate your home page
- How to use Java Applet to make graphic
- Web data -- a useful tool for nono-programmer

Web-based Course Design

<< 48 >>
Education

Submit a program  Give your suggestion

Link to this site

- Collecting
- Science
- JavaScript Tutorial
- Mathematics
- Kids
- Sports & Health
- Language
- Misc. Education

<< 49 >>
## Dino Trilogy

Three award-winning educational games for ages 5-12: Dino Match, Dino Numbers, and I Spell.

<table>
<thead>
<tr>
<th>version: 4.0</th>
<th>size: 1040 KB</th>
<th>September 15, 1999</th>
<th>price: ****</th>
</tr>
</thead>
</table>

**producer:** DynoTech Software

![3.x](85) ![95](85) install support

Get three award-winning educational games for ages 5-12 at single low price: Dino Match (Memory Building), Dino Numbers (Arithmetic Skills), and Dino Spell (Spelling Practice). These Windows games have been optimized to work with Windows 95 and OS/2 Warp [NSTL Certified]. Dino Trilogy was designed by a team of professional educators. Dino Numbers (ages 7-10)

- 10 min at 14.4k
- 5 min at 28.8k
- 4 min at 33.6k
- 1 min at 128k isu

<< 50 >>
TypingMaster 98 Typing Tutorial
Typing tutor with intelligent Review Wizard

<table>
<thead>
<tr>
<th>version: 4.3</th>
<th>size: 2600 KB</th>
<th>September 22, 1998</th>
</tr>
</thead>
<tbody>
<tr>
<td>producer: TMP Software</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

TypingMaster 98 for Windows is an award-winning touch typing tutor, which covers study material from the very basics all the way to advanced text typing exercises. Learning is efficiently backed up by educational games and the intelligent Review Wizard. TypingMaster is suitable for individual users as well as organizations with large network environment. Thanks to naturally designed user interface, both computer experts and inexperienced users feel comfortable with the program. Features: - Guided studying with multi-form exercises - Customizable studying profile - Intelligent Revision Wizard - Typing feedback and progress diagrams Support for multiple users - Network features

| 24 min at 14.4k | 12 min at 28.8k | 10 min at 33.6k | 3 min at 128k is: |

<<51>>