November 20, 2000

MEMORANDUM FOR HEADS OF DEPARTMENTAL ELEMENTS

FROM: MICHAEL L. TELSON   /S/
             CHIEF FINANCIAL OFFICER

SUBJECT: STATEMENT OF FEDERAL FINANCIAL ACCOUNTING
             STANDARDS NUMBER 10, "ACCOUNTING FOR INTERNAL USE
             SOFTWARE"

**Note: This package has been reviewed by the Field Management Council and has been
       approved by the Deputy Secretary for release.**

The purpose of this memorandum is to implement the requirements of the Federal Accounting Standards Advisory Board's Statement of Federal Financial Accounting Standards (SFFAS) Number 10, "Accounting for Internal Use Software." SFFAS Number 10 requires federal agencies, starting in FY 2001, to capitalize internal use software--whether it is commercial off-the-shelf (COTS), contractor-developed, or internally developed--for reporting as an asset in their financial statements. This Standard includes software that is used both to operate an entity's programs (e.g., financial and administrative software, including that used for project management) and to produce its goods and services.

This Standard has wide-ranging implications affecting many organizations throughout the Department. To this end, we established a cross-functional, headquarters/field working group to address the major issues. The resolution of these issues is reflected in the attached implementing guidance.

Please note that SFFAS Number 10 is an accounting standard only and, as such, costs incurred for internal use software should be capitalized regardless of funding source if the Department's capitalization criteria are met. With regard to entry of data into the web-based system being developed to capture federal labor hours associated with software projects, Field Chief Financial Officers should be responsible for ensuring that input occurs on a regular and timely basis.

For your information, SFFAS Number 10 is available on the Internet at the following address: http://www.financenet.gov/financenet/fed/fasab/concepts.htm. If you have any questions or concerns with regard to this memorandum, please call me on 202-586-4171 or have your staff call Mary Rosicky on 202-586-9354.

Attachment

cc: Field CFOs
       Information Technology Council Membership

**STATEMENT OF FEDERAL FINANCIAL ACCOUNTING STANDARDS NUMBER 10
ACCOUNTING FOR INTERNAL USE SOFTWARE**

IMPLEMENTING GUIDANCE

1. **INTRODUCTION**

    a. *Purpose/Applicability.* This guidance implements the requirements of the Statement of Federal Financial Accounting Standards (SFFAS) Number 10, Accounting for Internal Use Software, which requires federal agencies to capitalize the cost of software when such software meets the criteria for general property, plant, and equipment (PP&E). The Standard is effective October 1, 2000, and is applicable to all internal use software either purchased or in the development phase after September 30, 2000. Costs incurred prior to the effective date are not to be capitalized. SFFAS Number 10 applies to internal use software procured, developed, licensed, or leased by federal as well as contractor entities, assuming that the Department will own either the software itself or the functionality provided by the software in the case of licensed or leased software.

    b. *Exclusion.* Legacy waste software; i.e., internal use software whose primary purpose (more than 50%) is to support activities associated with the environmental cleanup effort, is excluded from the requirements of SFFAS Number 10. In cases where EM provides support for a system that is primarily non-legacy waste (such as BMIS or CHRIS), such costs are not excluded from this guidance.

2. **DEFINITIONS**

    a. Software includes the application and operating system programs, procedures, rules, and any associated documentation pertaining to the operation of a computer system or program. "Internal use software" means software that is purchased from commercial vendors "off-the-shelf," internally developed, or contractor-developed solely to meet the Department's internal or operational needs. Normally software is an integral part of an overall system(s) having interrelationships between software, hardware, personnel, procedures, controls, and data. This definition of internal use software encompasses the following:

        (1) *Commercial off-the-shelf* (COTS) software refers to software that is purchased from a vendor and is ready with little or no changes.

        (2) *Developed software.*

            (a) *Internally developed software* refers to internal use software that employees of the Department or its management and operating or other major cost-type operating contractors are actively developing, including new software and existing or purchased software that is being modified

with or without a contractor's assistance.

    (b) *Contractor-developed software* refers to software that the Department or its management and operating or other major cost-type operating contractors are paying a contractor to design, program, install, and implement, including new software and the modification of existing or purchased software.

    (c) *Integrated software.* Computer software that is integrated into and necessary to operate PP&E, rather than perform an application, should be considered part of the PP&E of which it is an integral part and capitalized and depreciated. The aggregate cost of the hardware and software should be used to determine whether to capitalize or expense the costs.

b. *Enhancements* are defined as changes to software that add capability or functionality. Paragraph 73 of *Appendix A: Basis for Conclusions* of SFFAS Number 10 states that "the Board [Federal Accounting Standards Advisory Board] believes that an 'enhancement' should be limited to instances where significant new capabilities [or functionalities] are being added to the software. Merely making the software more efficient and/or extending its service life should not constitute a capitalizable cost."[1]

c. *Software Development Phases.* Software's life-cycle phases include planning, development, and operations. SFFAS No. 10 provides a framework for identifying software development phases and processes to help isolate the capitalization period for internal use software. The following table illustrates the various software phases and related processes.

Systems planning or Conceptual design phase (Do not capitalize)	Software development phase (Capitalize)	Post-Implementation/ operational phase (Do not capitalize)
• Conceptual formulation of alternatives • Evaluation and testing of alternatives • Determination of existence of needed technology • Final selection of alternatives	• Design of chosen path, including software configuration and software interfaces • Coding • Installation to hardware • Testing, including parallel processing phase	• Data conversion • Application maintenance

3. CAPITALIZATION CRITERIA

a. *Capitalization Threshold.* Capitalize internal use software with a service life of two years or more and a cost of $750,000 or more upon completion of the software development phase or upon purchase of COTS, including material internal costs of implementation.[1]

b. *Software work in progress.* During the software development stage, costs will be capitalized similar to construction work in progress and amortization will begin after final acceptance testing has been successfully completed. If use of a particular module is dependent upon completion of another module(s), the amortization of both modules will begin when acceptance testing has been successfully completed on both modules.

c. *Bulk Purchases.* A bulk purchase of software is the single purchase of like items of software in a lot, with the cost of each individual item being below the Department's established software capitalization threshold. Generally, bulk purchases of internal use software that meet the Department's established capitalization threshold and two-year life shall be capitalized if it is determined that period costs would be distorted or asset values significantly understated if numerous copies of a software application or components of a software system were expensed.

d. *Distinguishing capital expenditures from operating expenditures.* The following table shows which phases of a software project should be capitalized and which should be expensed.

Phases of Software Task/Project	Capitalize or Expense?
Conceptual Design	Expense
Authorization	Initiate Capitalization
Design & Implementation	Capitalize
Testing and Documentation	Capitalize
Data Conversion	Expense
Acceptance	Terminate Capitalization
Initial Training	Expense

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[1]The $750,000 threshold applies not only to the current increment of a phased software project but also to planned future increments and enhancements if the aggregate cost exceeds $750,000.

Phases of Software Task/Project	Capitalize or Expense?
Operation	Expense
Maintenance	Expense
Enhancement	Capitalize if enhancement results in increased capability or functionality and Capitalization Threshold is met
Impairment	Reduce Capital Value
Retirement	Remove Capital Asset

e. *Specific Capitalization Guidance.* The following costs related to the purchase, development, or modification of internal use software should be capitalized if those costs exceed the capitalization cost threshold and the software is expected to have a service life of two years or more:

The actual cost of software procured from a software provider and any material internal cost incurred by the Department to make COTS software ready for use.

(2) The direct and indirect costs of developing software internally including documentation manuals. The direct costs of developing software include internal labor charges for personnel compensation and benefits of programmers, systems analysts, project management, and administrative personnel directly involved in the planning, designing, coding, or testing of the software, and costs incurred for supplies during the development stage.

(3) The amounts paid to contractors to design, code, test, install, and implement the software, plus any material internal cost incurred by the Department to make the software ready for use.

(4) Software configuration, software interfaces, and installation to hardware.

Testing, including any parallel processing.

Documentation.

f. *Cutoff for Capitalization.* Costs incurred after final acceptance testing has been successfully completed should be expensed. Where the software is to be installed at multiple sites, capitalization of each site's costs should cease after testing is complete at that site.

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4. POLICY

a. *Internally Developed Software.*

(1) For internally developed software, capitalized cost should include the full cost (direct and indirect cost) incurred by the Department during the software development stage. Such cost should be limited to costs incurred after:

    (a) management authorizes and commits to a computer software product or project and believes that it is more likely than not that the project will be completed and the software will be used to perform the intended function with an estimated service life of two years or more and;

    (b) the completion of conceptual formulation, design, and testing of possible software project alternatives.

(2) For federally developed software, the full cost of federal salaries incurred during the software development stage should be capitalized when material. It should be noted that, in all likelihood, infrequent or tangential involvement in a particular software project would not be considered to be material. To accommodate those federal offices that do not have a sophisticated timekeeping system for charging employee time to projects, the Office of Chief Financial Officer has developed a web-based data collection system to facilitate the record keeping process and to document the calculation of such costs. This system, which can be accessed at http://cr84mg.cr.doe.gov/projecthours/logon.asp, should be used for recording employee time spent on individual projects. To ensure accuracy, Project Managers should ensure that employee time is recorded as frequently as each pay period but no less frequently than each quarter. The attached "Data Entry Form" from the web-based system reflects the data elements which will be used for reporting material internal cost incurred by federal employees during the software development stage. Pursuant to the requirement that internally developed software include indirect costs incurred during the software development stage, a Departmental indirect rate will be established to be applied to federal labor costs. The web-based system will automatically apply this rate against the labor costs entered and calculate the indirect costs.

(3) For internal use software developed by management and operating or other major cost-type operating contractors (assuming that such software will be owned by the Department), the full cost of contractor employee salaries incurred during the software development stage should be capitalized when material. Contractors should use currently existing timekeeping systems to charge employee time, as appropriate, to internally developed software projects.

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b. ***Contractor-developed software.*** Capitalized costs should include the amount paid to a contractor to design, program, install, and implement the software. In addition, material internal cost incurred by the Department or its management and operating or other major cost-type operating contractors to implement the contractor-developed software and otherwise make it ready for use should be capitalized.

c. ***Commercial off-the-shelf (COTS) software.*** Capitalized costs should include the amount paid to the vendor for the software. In addition, material internal cost incurred by the Department or its management and operating or other major cost-type operating contractors to implement the software and otherwise make it ready for use should be capitalized.

d. ***Licensed or leased software.*** The Department's existing policy on capital lease accounting and capitalization of bulk purchases should be applied to software which is licensed or leased.

5. **AMORTIZATION.** Software that is capitalized pursuant to this standard should be amortized on a straight-line basis in accordance with the following chart depicting standard service lives (years) for various types of software:

TYPE OF SOFTWARE	SERVICE LIFE (YEARS)
Enterprise and other business software – *Enterprise Software usually has application to multiple departments or divisions and supports a broad range of business processes and is normally purchased and not developed.* *Other business software includes those applications used to manage individual business functions. Examples include finance, human resources, procurement, inventory, and warehouse management, maintenance management, and production scheduling.*	7
Personal productivity and desktop operating software – *Typically used on a personal computer to support office functions including word processing, spreadsheet manipulation, and graphics and overhead production. May reside on a personal computer's hard drive or be accessed from a server.*	3

TYPE OF SOFTWARE	SERVICE LIFE (YEARS)
Scientific software and manufacturing support software – *Software that produces results that are used by engineering or research and development organizations in support of preparation of technical documents, drawings, process flowsheets, specifications, etc. Examples of this type of software are Mathematical™, Intergraph™, etc. This does not include software used in process control.*	5
Process software – *Typically classified as part of another system, subsystem, or component (SSC) that is integral to the control, monitoring, or assistance in the operation of one or more of these components.*	7
Operating systems and Systems administration middleware; Layered software; E-mail; Run-time services; Communications; Development tools and Utilities (including databases) – *This type of software is typically mainframe or mid-range server oriented. Much of it is transparent to most users and is associated with the computing infrastructure. Enterprise E-mail requiring a significant support staff (3 or more) and running on mid-range or larger servers is also included.*	5

6. **ENHANCEMENTS**

    a.   The acquisition cost of enhancements to existing internal use software (and modules thereof) should be capitalized when it is more likely than not that they will result in significant additional capabilities or functionalities.

    b.   Enhancements normally require new software specifications and may require a change of all or part of the existing software specifications as well. The cost of minor enhancements resulting from ongoing systems maintenance should be expensed in the period incurred. Also, the purchase of enhanced versions of software for a nominal charge are properly expensed in the period incurred. Cost incurred solely to repair a design flaw or to perform minor upgrades that may extend the **useful life** of the software without adding capabilities or functionalities should be expensed.

    c.   If new releases or new versions of software result in increased capability or functionality and they meet the Department's capitalization threshold and two-year life, they should be capitalized.

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d. *Examples of Enhancements.*

   (1) Modification of an existing Human Resources/Payroll system to add employee self-service functions, such as on-line withholding allowance updates, on-line leave bank balances, on-line banking allotments, etc.

   (2) Expansion of a facility's security control system to provide the capability to recognize fingerprints or retinas.

7. IMPAIRMENTS

a. Impairment should be recognized and measured when one of the following occurs and is related to post-implementation/operational software and/or modules thereof:

   (1) the software is no longer expected to provide substantive service potential and will be removed from service, or

   (2) a significant reduction occurs in the capabilities, functions, or uses of the software (or a module thereof).

b. If the impaired software is to remain in use, the loss due to impairment should be measured as the difference between **book value** and either (1) the cost to acquire software that would perform similar remaining functions (i.e., the unimpaired functions) or, if that is not feasible, (2) the portion of book value attributable to the remaining functional elements of the software. The loss should be recognized upon impairment, and the book value of the asset reduced accordingly. If neither (1) nor (2) above can be determined, the book value should continue to be amortized over the remaining useful life of the software.

c. If the impaired software is to be removed from use, the loss due to impairment should be measured as the difference between the book value and the **net realizable value (NRV)**, if any. The loss should be recognized upon impairment, and the book value of the asset should be reduced accordingly.

8. ACCOUNTING/PROPERTY SYSTEMS.
Accounting entries to record the capitalized cost for internal use software in the Department's accounting system will be developed and issued by the Office of Financial Control and Reporting (CR-40). Property record systems shall be used to facilitate any entry of capitalized costs in the accounting systems. However, the Federal Property Management Regulations, and thus this guidance, do not require that inventory control (e.g., conducting physical inventories) of internal use software, which is an intangible asset, be managed by the property record systems. Such control shall be managed by the systems project managers.

9. POINT OF CONTACT.
Questions or concerns with regard to this guidance should be directed to the Office of Financial Policy, CR-20, 202-586-4860.

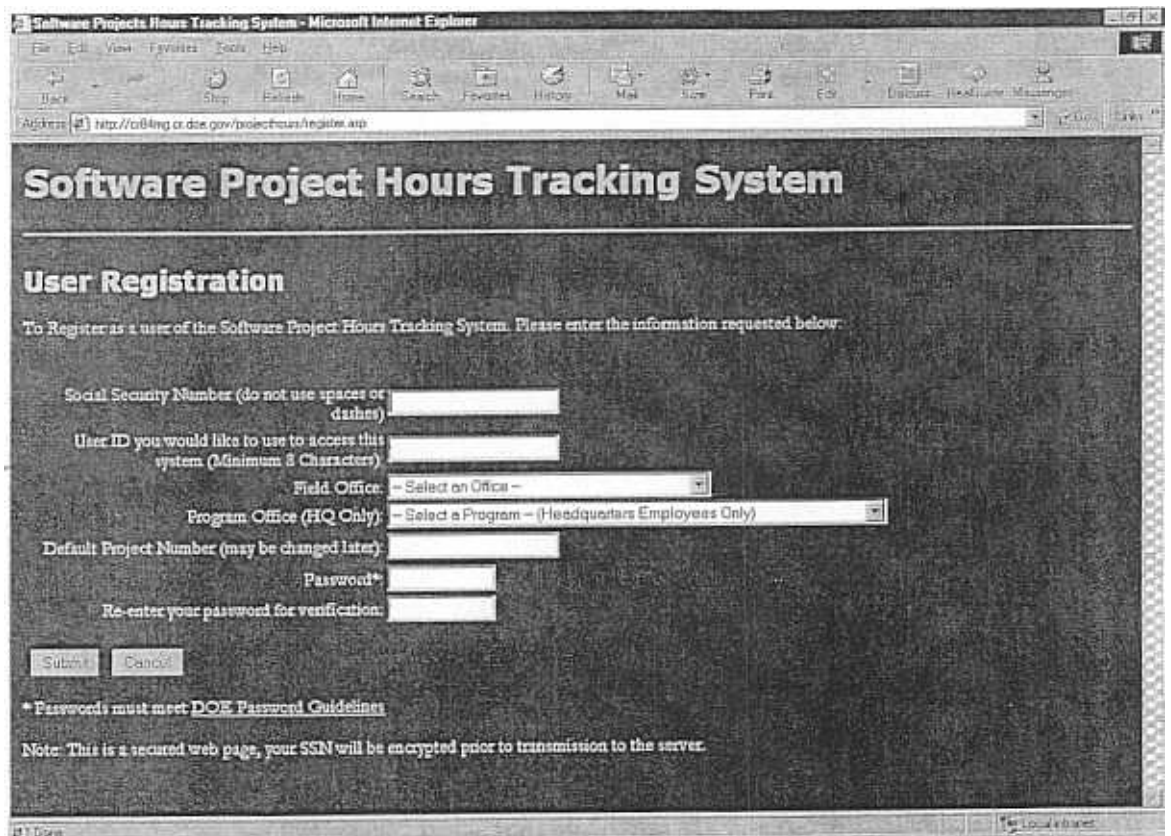# Software Projects Hours Tracking System
User Instructions

Logging on to the System:

Open your web browser and enter the address https://crinfo.doe.gov/swprojects

2. Read the Notice to Users, and click the "Proceed to Logon" link.

Registering as a New User:

1. Click on the "Register as a New User" button. The following screen is displayed:

2. Enter your 9-digit Social Security number, do not use any spaces or dashes. Your Social Security number is encrypted prior to transmission to the server. It will not be displayed within the system and is used for retrieving your pay rate, location, and default B&R charge information only.

3. Enter the User ID provided by the Software Project Hours Systems Administrator. You will use this ID each time you logon to the system.

4. Select the field office where you work from the drop-down list.

5. If you work at DOE Headquarters, select the program office for which you work. Employees working in the field may skip this step.

6. Enter the project number of the project you most frequently use as the Default Project Number. This entry will automatically appear when you enter hours worked on a project, it may be changed later or may be left blank if you work on multiple projects.

7. Enter a password for your user account on the system. The password must meet DOE password guidelines. If you are unfamiliar with these guidelines, click on the "DOE Password guidelines" link for instructions.

8. Click the "Submit" button.

9. A confirmation screen will appear with your user information. If any of this information is not correct, please call the Software Project Hours System Administrator to help you correct any problems.

10. Click the "Continue" button to go to the main menu.

Logging on if you are already registered as a user:

1. Enter your user ID and Password and click on the "Logon" button.

2. When you have successfully logged on, a confirmation screen will appear. Please take note of the information on this screen to ensure that no one has accessed your account without your permission. If you believe that an unauthorized individual has accessed your account notify the System Administrator immediately.

3. Click on the "Continue" button to proceed to the main menu.

Using the System:

The system's main menu has several options. (see the screen below)
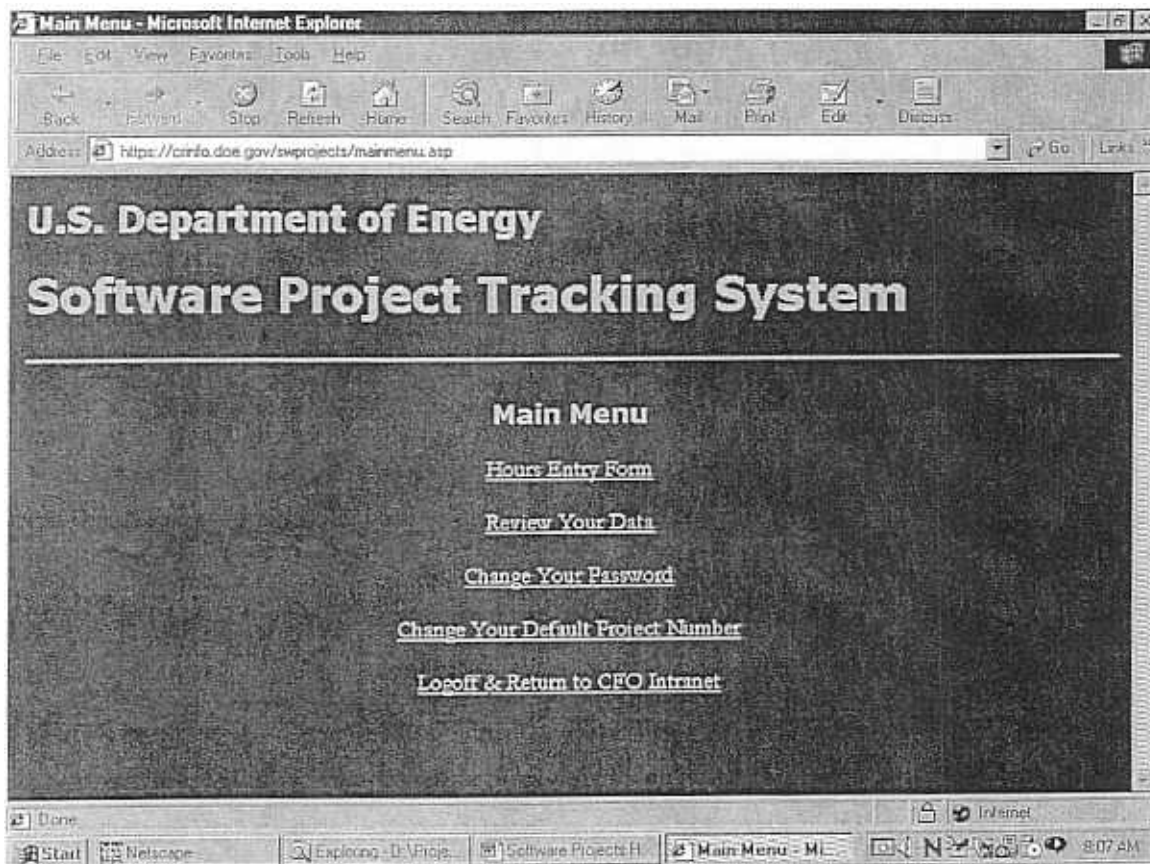
Hours Entry Form – Displays the data entry form so that you may enter your hours worked and other costs associated with a project.

Review Your Data – Displays a table listing all data you have entered, sorted by project number and date.

Change Your Password – Displays the form to change your system password.

Change Your Default Project Number – Displays the form to change the project number which is automatically filled in on the Hours Entry Form.

Logoff – Ends the session and logs you off of the system. Please be sure to select this option before closing your web browser, this ensures that no one can access your account and frees computer resources for other users.

Using the Hours Entry Form:

1. Enter the project number of the software development project in this field. This field is automatically filled in with your default project number. To change the default project number, use the "Change Default Project Number" option on the main menu.

2. This field is automatically filled in with the B&R normally charged for your labor costs. If the majority of your hours for the period were charged to another B&R, you should change this field to the other B&R.

3. Select the month and year you worked on the project or in which you charged travel or miscellaneous costs from drop down lists.

4. Enter the number of hours you worked on the project for the month and year that you selected.

5. Enter the dollar amount of travel costs you incurred on this project during the month and year that you selected.

6. Enter the dollar amount of miscellaneous costs you incurred on this project during the month and year you selected.

7 Click on the "Submit" button to enter the data or click the "Cancel" button to cancel the data entry and clear the form. You will see a message indicating if your data has been saved or the entry cancelled.

8. When you have finished making entries, click the "Return to Main Menu" button to return to the menu.

Reviewing your Data:

1. Select the "Review Your Data" option from the main menu. Your data will be displayed in the format shown below.
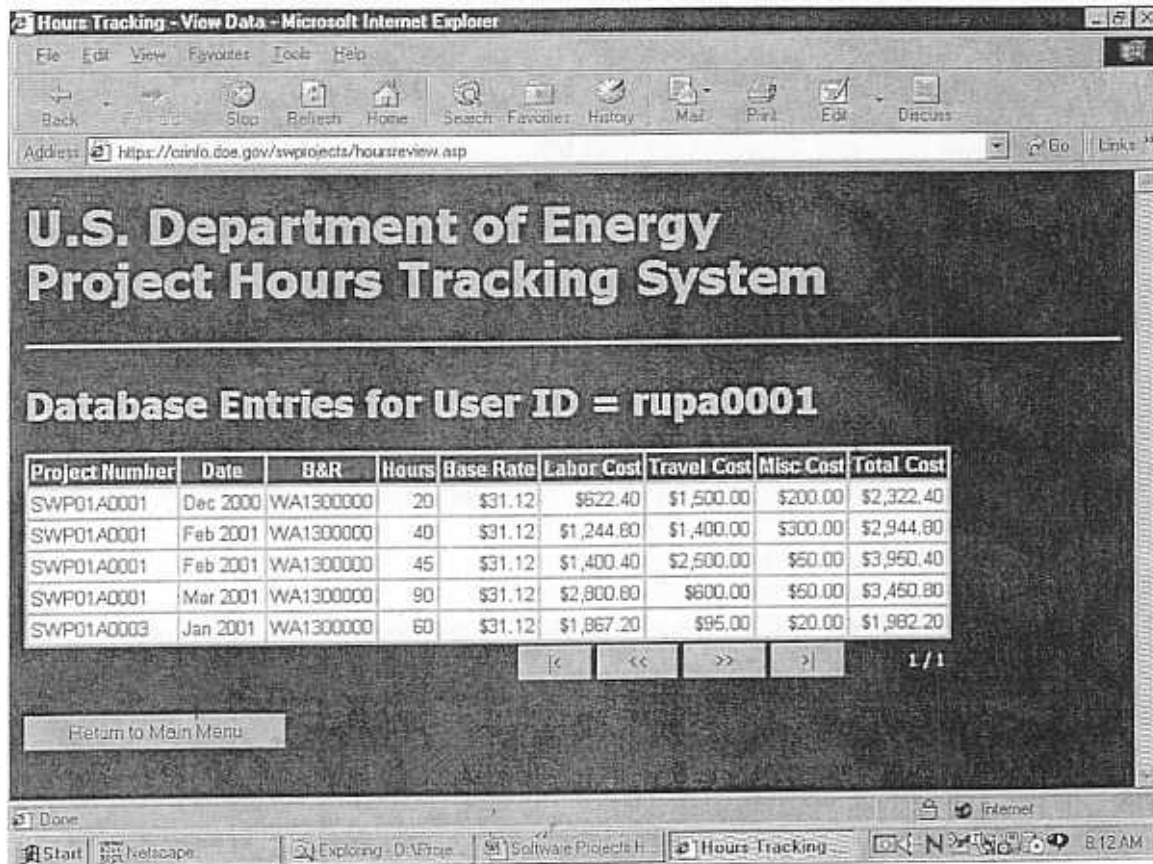
2. Use the navigation buttons to move between pages the button functions are listed below:

    |< Move to the first page
    << Move back one page
    >> Move forward one page
    >| Move to the last page

    The numbers at the lower right hand corner of the table indicate the total number of pages and the number of the current page you are viewing. For example, 1 / 2 indicates you are on page 1 of 2 pages.

    When you have finished reviewing your data, click on the "Return to Main Menu" button to return to the menu.

Changing your Password:

1   Click on the "Change your Password" option on the main menu. The screen shown below will appear.

2. Enter your current password in the first field.

3. Type a new password in the "New Password" field. Your new password must meet DOE password guidelines.

    Re-enter your NEW password for verification.

5. Click on the "Submit" button

Changing your Default Project Number:

1. Select "Change your Default Project Number" from the main menu.

2. Enter your new default project number.

3. Click "Submit Change" to accept the new project number or "Cancel" to cancel your change.