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Department of Energy
Washington, D.C. 20585

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MAR 27 1986

Mr. Joseph O. Bunting, Chief
Policy and Program Control Branch
Division of Waste Management
Office of Nuclear Material Safety
and Safeguards
U. S. Nuclear Regulatory Commission
7915 Eastern Avenue
Silver Spring, Maryland 20555

Dear Joe:

The enclosure to this letter is a DOE action memorandum that we developed to provide guidance internally on how to proceed with development of the geologic repository Licensing Support System (LSS). This memorandum specifies, at a detailed conceptual level, the material that should go into the LSS, who should have access to it, and what other functions the LSS should perform.

We recognize that the approach discussed in the enclosure is appropriate for discussion with the NRC and with representatives of the States and Indian Tribes. Accordingly, I request that you review the enclosure and provide us with any comments you may have. If possible, we would like to discuss your comments at the next meeting of the LSS Interagency Coordinating Committee, currently scheduled to be held on April 22, 1986. I am also distributing the memorandum to the States and Tribes so that they can be prepared to participate in the meeting and offer their comments as well.

If you have any comments or questions in the interim, you can reach me on 252-5355 or Charles Head on 252-5625.

Sincerely,

Ralph Stein

Ralph Stein, Director
Engineering & Geotechnology Division
Office of Geologic Repositories

Enclosure:
DOE memorandum from Ralph Stein to W. J. Purcell of March 21, 1986, titled "Scope of the OGR System to Handle Information to Support Repository Licensing"

cc: P. Altomare, NRC

DOE F 1325.8
(10-84)

United States Government Departme

memorandum

DATE: MAR 2 1 1986

REPLY TO ATTN OF: RW-24

SUBJECT: Scope of the OGR System to Handle Information to Support Repository Licensing

TO: William J. Purcell, RW-20

Background

At a meeting of OCRWM senior management held on November 8, 1985, a decision was made to proceed with development of a computerized system to collect, store and retrieve information needed to support licensing of a geologic repository. The basic elements that were discussed for incorporation into this system are as follows:

1. Archives database (Attachment 1)
2. Key Documents database (Attachment 2)
3. Issues tracking (Attachment 3)
4. Commitments tracking (Attachment 4)
5. Regulations access (Attachment 5)
6. Licensing Schedule Networks (Attachment 6)

One of the key next steps in follow-up to the November 8 meeting is to determine the scope of each of the elements of the system, and to define what individuals and/or organizations should have access to the various parts of the system. The attachments to this memorandum discuss each of these issues in turn and recommend a position to be taken by OGR. In addition, as a aid in getting a quick overview of the contents of the attachments, we have prepared the following summary of the options considered in each attachment, and the preferred option which I am recommending for your approval.

Summary

a. Archive Database - The basic information categories that were considered for storage in the archives are as follows:

1. Key OGR licensing documents.
2. Key OGR licensing documents plus supporting technical documents.
3. All OGR documents.
4. All relevant OGR documents plus appropriate regulatory agency information.

Option 4 is recommended.

In addition, the attachment discussing the Archive Database includes a detailed description of the types of materials that I

propose that we place in the archive. The following table summarizes the recommendation:

Type of Material	Include in Archive
1. DOE originated memos, letters & documents (clean copies)	Yes
2. Letters, memos and documents received by DOE (clean copies)	Yes
3. Drafts of correspondance and documents formally circulated for comment outside of DOE	Yes
4. Hand written material	No
5. Marked up copies of correspondance or documents	No
6. Electronic mail	No
7. Drafts kept internal to DOE	No

b. Key Documents Database - The types of documents for storage in the key documents data base and other option considered were as follows:

1. Major regulatory related documents only.
2. All major program documents.
3. Eliminate the separate Key Documents Database and use the archives database instead.

Option 3 is recommended.

c. Issue Tracking - The types of issues that were considered for tracking include the following:

1. Issues related to NRC regulations only.
2. Issues related to NRC, DOE, other Federal, State, and Local rules and regulations.
3. All major OGR program issues.

Option 2 is recommended.

d. Commitment Tracking - The types of commitments that were considered for tracking and the other option for handling this function are as follows:

1. Commitments to regulatory agencies only.
2. Commitments to regulatory agencies, States and Tribes.
3. All major program commitments.
4. Combine the commitment tracking function with the issue tracking function.

Option 2 is recommended.

e. Access to Regulations - This function would include providing access to regulations with which the OGR program must comply, and to analyses of key, questionable portions of those regulations. The options that were considered for the types of regulations to be covered are as follows:

1. Federal regulations only.
2. Federal and State regulations only.
3. Federal, State, and local regulations.

Option 3 is recommended.

f. Licensing Schedule Networks - The options considered for how to handle schedule networks for licensing activites are as follows:

1. Cover regulatory milestones and activities of regulatory groups only.
2. Cover only regulatory milestones, activities of regulatory groups, and those engineering, testing and administrative activities necessary to support regulatory compliance.
3. Cover all OGR activities.
4. Eliminate the licensing schedule networks in the LSS and use the general OGR schedule networks instead.

Option 4 is recommended.

g. Access to the System - The options that were considered for different levels of access to the system are as follows:

1. Access by DOE only.
2. Access by DOE and regulatory agencies only.
3. Access by all parties to the licensing hearings.
4. Selected access by all parties to the licensing hearings.
5. Access by the public at large.
6. Selected access by the public at large.

Option 6 is recommended.

Name Change

In addition to the issues discussed above, over approximately the last two months, we have had an increasing number of contacts from representatives of various parts of DOE-MA and others who are responsible for carrying out various portions of the Department's information management functions. These individuals have, at first, been misled as to the purpose and function of the system because of the use of the word "information" in the title.

Although we have been able to resolve most of the concerns raised by NA and others so far, there is a potential for further questions in the future. Accordingly, after discussions with Ed Kay, Bob Bauer and others on the best way to reduce the potential for future misunderstandings, I suggest that the name of the system be changed to "Licensing Support System" to remove the implication that we are setting up an information management system that has special meaning in the Federal establishment. This new terminology is used throughout the attachments to this memorandum. Please let me know if you prefer another name.

Requested Action

I am requesting that you consider the recommendations in the attachments and let me know whether or not you agree with my proposals. A concurrence block is provided below for you use in indicating your decision.

Ralph Stein

Ralph Stein, Director
Engineering and Geotechnology Division
Office of Geologic Repositories

Attachments:
1. Scope of the Archive Database
2. Scope of the Key Documents Database
3. Scope of the Issue Tracking Function
4. Scope of the Commitments Tracking Function
5. Scope of the Regulations Access Function
6. Licensing Schedule Networks
7. Access to the Licensing Support System Databases

APPROVED: _____ DATE: 3/21/86

DISAPPROVED: _____ DATE: _____

Attachment 1

Scope of the Archive Database

BACKGROUND

As part of the Licensing Support System (LSS) that is under development by OGR, it is planned that the Archive database would serve as a comprehensive technical and administrative data/documentation file for support of OGR licensing and regulatory related activities. The purpose of this document is to analyze and recommend the scope of the material to be put into the Archive database. Also, for purposes of this document, the term OGR is meant to encompass the entire OGR program, including the Project Offices and all contractors involved in the OGR program.

DISCUSSION

There are several basic questions that were considered in evaluating options on the scope of the Archives database:

(1) Which of the basic categories of OGR information should be in LSS (e.g., Key licensing and regulatory documents only, supporting engineering documents, all OGR information, all regulatory agency information, etc.)?

(2) Of all material defined above, what is an allowable form (e.g., handwritten notes, margin notes, internal memos, drafts, material received by DOE as well as published by DOE, etc.)?

(3) Are there forms of information that should be in the LSS, but that, due to their nature, are best kept in "satellite" files?

(4) Of the basic categories put in, what if any "privileged" information should be left out or have access to it controlled?; and

(5) How should we handle information that was generated before the information collection process is started?

The latter four of the questions listed above will be discussed prior to the consideration of the input options addressed by question (1).

1. Allowable Information Forms - The key consideration to be recognized here is the "form" of information that will be open to the discovery process during the licensing hearings. On this point, OGC has informed us that essentially all information, no matter what its

form, may be open to discovery, with a few well defined exceptions. The exceptions are discussed below as "privileged information".

Accordingly, I recommend that all formal, permanent information be placed in the Archive to simplify access to it later during discovery, litigation, or during any other process when timely access to it is important.

By formal, permanent information, I mean in concept the following (the final details will be spelled out in the LSS operating procedures that specify how to collect the information):

a. All final, signed correspondence and internal memoranda generated by or received by OGR. Material received by the OGR program should be placed in the Archive whether it is typed or, as may be the case for some correspondence from the public, hand written. (Note: Information in these forms may be transmitted electronically through use of a telecopy machine or by transferring a file containing them via a computer link, but it is not "electronic mail".)

b. All final documents originated by or received by OGR.

c. All drafts of correspondence or documents that are formally circulated for comment outside of DOE or DOE's repository program contractors.

I consider that the following forms of information should not be placed in the Archive:

a. Internal, hand written notes.

b. Marked-up copies of correspondence or documents.

c. Electronic mail (this refers to non-permanent, unsigned messages transmitted by services such as Dialcom that are, in essence, one way, written telephone calls).

Since a. and b. above may be subject to discovery (including each copy of any document that has been marked up with margin notes), they would have to be kept in the archive if they are to be kept by the OGR program at all. This would result in an unreasonable and unnecessary additional demand for system capacity.

Accordingly, I consider that OGR will have to institute a formal process of training the repository program staff to avoid using or keeping such material, and that OGR will need to institute procedures to keep its files, and those of its employees (and departing employees), clear of such information. Otherwise, we would have to take on the essentially impossible task of attempting to ensure that any material that might be kept by any OGR program participant is entered into the archive.

2. Satellite Files - Certain types of information, such as physical samples (e.g. well cores that result from exploratory drilling) cannot be loaded into a computerized records system. Similarly, some types of records which can be reduced to written records, such as the data resulting from well logging, or the metallurgical records pertaining to manufacture of shaft liners, would be meaningless, to anyone other than a few experts, if they were displayed in a full text mode on a computer screen. Such records are expected to be collected in large numbers by the OGR program and must be protected for potential use during the licensing process. However, I recommend that such records be kept in "satellite files" rather than loading them directly into the main system. By a "satellite file" I mean a controlled information repository under the control of, and indexed in the main system. Such a "satellite file" could be the warehouse in which the well corings are stored, the store room containing the records of the shaft liner manufacture, or the computer on which the magnetic tapes of well logging information are loaded. Such "satellite files" would be a part of the system, but would only be addressable by requesting access to the information in them via the records custodian responsible for them.

3. "Privileged Information" - Since public access to the LSS is currently planned, there may be a need to protect certain "privileged" information. In OGC's opinion, examples of the material that could be considered privileged would be any material exempt from FOIA, lawyer-client advice and attorney work products, security material, and pre-decisional and deliberative agency records. Such material is planned for inclusion in the LSS to facilitate its accessibility for day to day purposes, and to aid the program in responding to FOIA requests during discovery, but it will be protected so that only DOE

has access to it. (DOE will be obliged to report the existence of privileged information and explain why it is privileged, even though it may be protected from disclosure.) The security information may cease to be covered by the privilege after a period of time, e.g. after a shipment is made, the transportation route would no longer be privileged. DOE will have access to all privileged material at any time, but non-DOE users (including DOE contractors) will not.

Privileged information generated within the repository program should be identified as such by the originator at the time that it is generated. The system will include operating procedures to specify how this is to be done.

4. Prior Information - A substantial amount of information has already been generated by the program and more will be generated before the information capture procedures come into effect. Since a portion of this information is also likely to be required for repository licensing, it should be in the system. However, since there is no finite cutoff for prior information, some policy must be set for how we should go about collecting this information. I recommend that we attempt to load all pertinent information back to passage of the Nuclear Waste Policy Act of 1982 into the system for full text retrieval, just as will be the case for information to be collected in the future. I further recommend that we collect and reference, using abstracts and key words, all earlier information in the files of the OGR program participants or in storage by the DOE Office of Scientific and Technical Information for the 10 year period prior to passage of the Act.

Basic Information Categories - In regard to the first question under Discussion, the question of what basic information categories get put into the Archive database is the most important question OGR must answer given the Archive's importance to the legal staff regarding DOE's license application. The legal staff will need to have rapid access to all information affecting basic program decisions on the health and safety of the public and the protection of the environment. Equally important, if not more so, is the reference material upon which such decisions are based.

Also, it should be noted that DOE's ability to deal effectively with the hearing process, thereby avoiding critical path delays, is negated if the NRC does not perform equally well.

Accordingly, NRC must be given access to the DOE system, not just for information retrieval, but for input as well.

In addressing the question of which categories of information to place in the LSS, we must also consider the following questions: (1) Can a subset of all OGR information be identified as the information that is needed for licensing? and (2) Can the WBS be used to assist in identifying the licensing information?

OGC holds the view that the information that will be required to complete licensing can not be fully known until specific licensing issues are defined by the hearing board shortly before the hearing process commences and that to ignore a given segment of information as "non-licensing" would leave us unprepared, since other parties to the hearings very likely would question topics in that area. Further it should be recognized that other parties can continue to attempt to have the license revoked, suspended, modified or amended based on "new" information even after all licenses are obtained (10CFR60.42). In addition, since part of what almost everyone in the repository program and its contractors does is likely to be licensing related, it is highly unlikely that clear boundaries can be drawn, at this early stage, between those who work on "licensing" related topics and those who do not. These facts were considered in developing the options discussed below.

OPTIONS

The following options for material to be put into the Archive database have been considered.

1. Key OGR Documents Required by Licensing and Regulatory Requirements

   Under this option, only key documents required by licensing or regulatory requirements would be put into the archives. This would include those documents required to be submitted to Federal, State and local regulatory agencies from whom DOE must obtain licenses or permits to advance the repository program (e.g., SCP, EIS, SAR, excavation permits, etc.).

   Pros:

   a. The Archive System would be smaller, restricted to primary regulatory agency documents.

Cons:

a. The database would not include the reference material (studies, reports, etc.) upon which many regulatory decisions are based.

b. The database might not include information on subjects which become issues during the regulatory agency review or during hearings. Because licensing activities are so pervasive, it is difficult, if not impossible, to identify such information beforehand. Further OGC holds the view that to ignore a given segment of information at database formation could defeat one of its basic purposes.

c. The database would not include information from outside of OGR that could affect the regulatory process, such as NRC and State documents.

2. Key OGR Documents Required by Regulatory Requirements plus Supporting Technical/Environmental Documents

Under this option supporting engineering and environmental documents (e.g., design reports and analyses, test results, data, safety assessments, socioeconomic studies, meteorology data, etc.) that support the conclusions drawn in key documents required by regulation would be put into the system, along with the key documents.

Pros:

a. The database would include supporting technical and environmental data so that regulatory conclusions and the bases for them will be catalogued for rapid retrieval and everyday use.

b. The expanded database would be more likely to contain technical information relevant to addressing issues that may be raised at the hearings.

Cons:

a. Same as Option 1, Cons (b) and (c).

b. The database would be expanded and require additional resources.

3. All OGR Information

Under this option all OGR information would be put into the database, establishing a comprehensive administrative and technical records system.

Pros:

a. Same as Option 2, Pros (a) and (b).

b. The expanded database would be more likely to contain administrative information relevant to addressing issues that may be raised at the hearings, such as those concerned with aspects of personnel records. For example, qualifications of key personnel and construction force (e.g., welders) may be an issue at the hearings.

c. The expanded database would contain information that may be helpful to the consultation and cooperation process, i.e., institutional material.

Cons:

a. Same as Option 1, Con (c).

b. The expanded database would contain certain categories of records not directly relevant to the regulatory process, such as financial, contractual, and institutional data.

c. The database would be expanded, requiring additional resources.

4. All Relevant OGR Information Plus Appropriate Regulatory Agency Information

Under this option, all "relevant" OGR information generated or received by OGR, the OGR Project Offices, and the direct contractors to the Project Offices (if they have a separate subdivision of their organization that is working solely for the OGR program) would be loaded into the system, together with similar Federal, State and regulatory agency information.

In addition, for Q-List, QA Level 1 or for other specific items, components or activities as may be specifically required by the OGR Licensing and Regulatory Division in order to cover topics that have a strong likelihood of being involved in the repository licensing process, all "relevant"

information pertaining to the production and supply of the item would be loaded into the system, including information from all levels of the supply chain down to and including the source of the item.

By "relevant" information, I mean all OGR information, minus clearly non-licensing related information. Examples of types of information that might be readily identified as being non-licensing related are financial, contractual and most personnel files and staff travel documents, Annual Reports to Congress, fee adequacy reports, internal office administrative documents, internal memoranda on EEO, CFC, etc., office supply and requisition documents, MBO reports, correspondence on grants or GETT, etc. The final determination of the actual information to be collected would be accomplished through the process of developing procedures governing the collection of the information to go into the system. Development of these procedures would include consideration of whether it is, in fact, worth the effort to try to separate such documentation, and the risks of erroneously disposing of documentation required for licensing.

Pros:

a. The expanded database would be more likely to contain all technical and administrative information necessary to conduct the licensing process.

b. Both NRC and other regulatory agencies who will be party to the proceedings would be aided by the system, thus speeding the overall licensing process.

c. Day-to-day operations at OGR would be enhanced, minimizing the potential for overlooking relevant information from diverse sources.

d. The OGR portion of the database would be reduced somewhat to exclude files clearly not relevant to regulatory activities.

Cons:

a. The database would be expanded and require additional resources to maintain.

RECOMMENDATION

I recommend that we pursue Option 4 above, and seek to establish a comprehensive Archive database relevant to the conduct of licensing and other regulatory activities. The detailed information collection procedures will be coordinated with the Project Offices to minimize difficulties in implementation.

Attachment 2

Scope of the Key Documents Database

BACKGROUND

As part of the OGR Licensing Support System (LSS) under development by OCRWM, it has been proposed that the Key Documents Database include the text of major program documents that are required by the licensing process, such as the EAs, SCPs, EIS, License Application, Safety Analysis Report, and license amendments. It would also include, on a section by section basis, references to the applicable portions of the regulations that require the Key Documents, and references to supporting documentation or other evidence of the program's compliance with the regulatory requirements. The purpose of this document is to analyze and recommend the scope of the Key Documents database.

DISCUSSION

Key documents will be generated in individual Project Offices and in OGR. These documents and their references will comprise the technical and administrative database that licensing/permitting agencies will use to render their evaluations. The overall purpose of the Key Documents database is to provide an inventory of current knowledge regarding Key Documents. This will help ensure an approach to the preparation of such documents that will satisfy regulatory requirements and project needs.

It has been proposed that Key Documents encompass OGR regulatory documents only or, alternatively, OGR programmatic and regulatory documents. Regulatory documents are those which are required by laws or regulations to allow governmental approval of siting, construction, operation and other pertinent OGR and project office activities. The term includes documents needed to comply with Federal, State and local permitting/certification requirements. Programmatic documents are those which are required to satisfy OCRWM program objectives, but are not mandated by Federal, State or local regulations.

Each entry into the Key Documents Database will include a statement of the basic purpose of the document and, if already prepared, the document itself (or access to it via the Archive database) and a listing of all its references. If not yet prepared, the system should contain (in addition to the document's basic purpose) the required format, content and data needs based upon the requirements of the NWPA, 10CFR960, 10CFR60, applicable NRC Regulatory Guides and Standard Review Plans, applicable DOE Orders and memoranda, NWTS Program experience and State/local regulations. Each entry would also provide

information on the interrelationships of any key document to all other pertinent documents which it feeds and to the OGR licensing schedule network.

OPTIONS

The following options for resolution of the questions on the scope of a Key Document database have been considered:

1. Regulatory-Related Documents Only

Under this option, only the major OGR regulatory documents intended for submittal to Federal or State licensing/permitting agencies would be covered by the system.

Pros:

a. The documents upon which NRC and State regulatory agencies will base their licensing and permitting evaluations would be highlighted to all project personnel helping to assure the completeness and consistency of the documents.

b. The references cited in the key documents would be instantly available to verify that assertions made in the primary licensing documents are supportable.

c. The documents upon which NRC and State regulatory agencies will base their licensing and permitting evaluations would be up-to-date and available to widely dispersed project engineers and designers to help assure that current information is available.

Cons:

a. All OGR licensing and regulatory documents would not be included.

b. Key regulatory-related documents may already exist in the Archives Database in sufficient detail for regulatory purposes, thus making their text available without requiring the extra effort necessary to identify or develop the other types of information (reference lists, interrelationships) to be stored in this database.

2. All Major Program Documents

Under this option, major program documents, as well as all regulatory documents and their references, would be covered by the system.

Pros:

a. All pros from Option 1.

b. The documents that provide the philosophy and general guidance for the overall program, not just in a regulatory sense, would be highlighted to all project personnel, helping to assure that project progress reflects these overall goals.

c. The inclusion of key programmatic documents could stimulate greater use of the system, helping coordination and integration.

Cons:

a. Key program documents can be included in the archive system, thus making their text available without requiring development of this system.

3. Use the Archive Database

Under this option, there would not be a separate key documents database. Instead, the key documents would be loaded into the archive database along with the remaining program documentation. The preparation of the key documents would be tracked using the program schedule networks, and the references to supporting documentation would be placed in the key document itself.

Pros:

a. The documents upon which NRC and State regulatory agencies will base their licensing and permitting evaluations would be available to all project personnel, helping to assure the completeness and consistency of the documents.

b. The references cited in the key documents would be available to verify that assertions made in the primary licensing documents are supportable.

c. Option 1, Pro (c).

d. Option 2, Pros (b) and (c).

e. This option would not require development of a separate system to handle key documents, thus simplifying the LSS.

Cons:

a. Key documents would not be highlighted by placing them in a separate system. However, they would be available just as quickly from the archive database.

b. More effort may have to be placed in preparation of the reference lists in the key documents. However, this is the same work that would otherwise have to be done after the fact by the system staff. Requiring that it be done during document preparation will probably result in a more complete job, since the key document authors would be the ones to identify their sources while they are fresh in the author's minds, rather than trying to reconstruct the reference list later.

RECOMMENDATIONS

I recommend that we adopt option 3 and eliminate the separate key documents database. If you agree with my recommendation, we will proceed to develop the LSS along these lines.

Attachment 3

Scope of the Issue Tracking Function

BACKGROUND

As part of the OGR Licensing Support System (LSS) under development by OCRWM, it has been proposed that the issue tracking function list topics that have been identified as being issues that will have to be addressed during the repository licensing and permitting process. The work plan to reach resolution of each issue (major actions and responsibilities), and references to related documentation, would also be included.

The purpose of this document is to analyze and recommend the scope of the Issue Tracking process.

DISCUSSION

The success of OGR's licensing/permitting efforts will depend in large measure on how rigorously DOE attempts to identify and resolve issues. Issues may be narrowly or broadly defined. In a regulatory sense, an issue may be defined as a topic that is important to the satisfaction of a technical regulatory requirement. In a programmatic sense, an issue may be viewed as any factor that may effect our ability to achieve the NWPA schedules. In either case, the issues may be identified as the result of planning work done internally by DOE, or they may stem from questions, comments and/or allegations from other Federal agencies, the States, the Tribes, or members of the public.

In its draft licensing assessment methodology document and in other printed material, NRC has made it clear that authorizations to construct and operate a repository cannot be issued until either all relevant regulatory concerns are resolved, or an acceptable plan for their resolution is put forth. Regulatory concerns will derive predominantly from 10CFR51 (environmental concerns) and 10CFR60/40CFR191 (health and safety concerns). More specifically NRC's regulatory requirements will be interpreted in NRC regulatory guides such as those specifying the format and content of the Site Characterization Plans and of the License Application (currently in draft).

Still other indications of potential issues will come from NRC, State, Tribe or public comments on DOE's Mission Plan, Project Decision Schedule, the EAs and SCPs. Additional questions as to data sufficiency and reasonableness of interpretations and conclusions will develop as DOE's investigations are completed and results are applied. The issue tracking function will need to identify these issues as they develop and provide a tool for

program management to initiate and track the efforts needed to resolve them and to ensure that this process is integrated with other OGR program management processes.

On a broader scale, it may be argued that all issues that could impede attaining the NWPA dates, a subset of which will be regulatory, should be tracked. In this view the ultimate goal is not the operating license per se, but rather the timely completion of the program. A yardstick would be needed to identify these issues as well except that, rather than just 10CFR60, the Mission Plan, the Project Decision Schedule and other programmatic documents would provide the goals and acceptance criteria.

In either case, i.e., whether issues are viewed as regulatory or programmatic in nature, the term issue will require further definition. For example an issue must be substantive, measured not only by the weight of its technical or programmatic content, but also by the effort necessary for resolution. The issues to be tracked should not address every technical detail that must be accomplished to comply with regulatory requirements, nor should they include items that have an immediately apparent solution. Rather, they should address concerns, raised either within the OGR program or by outside elements, that will require a specific additional effort to resolve, and that would substantively and detrimentally affect the program if they were to go unresolved. Further specifics concerning what constitutes an issue and how issues are identified will be specified in the procedures for operation of the LSS issue tracking function.

Several issue tracking processes are already in place in the OGR Project Offices. The issue tracking process being discussed here for inclusion in the LSS is intended to define the respective roles of headquarters and the Project Offices in resolving repository licensing issues, and to provide an overall OGR program licensing issue tracking capability. The methods of interaction between the LSS issue tracking function and those being operated by the Project Offices will be developed during preparation of the LSS issue tracking procedures.

OPTIONS

The following conceptual options for resolution of the questions on the scope of the Issue Tracking function have been considered.

1. Include Issues Related to NRC Regulations Only

Under this option, the issues tracked by DOE would include only those raised by NRC during the pre-licensing phase, the licensing phase and operating phase until permanent closure.

Pros:

a. The number of issues would be fewer allowing DOE to concentrate its resources on matters directly related to license/permit issuance, normally a critical path activity.

b. By concentrating solely on regulatory matters, it is more likely that the essential activity of scrutinizing all applicable regulations for their requirements will be accomplished to the level of detail required.

c. Regulatory requirements are readily identifiable.

Cons:

a. If the ultimate goal is a timely license, as opposed to a license, other issues which could delay the program would be excluded from formal identification and tracking.

2. Include Issues Related to NRC, DOE, Other Federal, State and Local Regulations

Under this option, the issues tracked by DOE would include issues generated as a result of DOE regulation (e.g., 10 CFR 960 and internal orders), other Federal agency regulation (i.e., EPA, DOT, OSHA, MSHA, DOI, etc.), State and local regulation, as well as NRC requirements.

Pros:

a. This approach would aid DOE in ensuring compliance with its own requirements.

b. DOE orders may be more restrictive than NRC requirements in certain applications and their inclusion could avert design backfits.

c. A detailed analysis of DOE requirements affecting design would be accelerated.

d. A compilation and analysis of State regulatory and/or permitting requirements will be developed, allowing DOE to identify and resolve potential issues beforehand.

e. Same as for Option 1, Pro (b).

Cons:

a. More resources would be required to implement this option.

b. Other issues which could delay the program would be excluded from a formal system of identification and tracking.

3. Include All Major OGR Program Issues

Under this option, the issues tracked by DOE would include those necessary to be resolved to accomplish the NWPA mandate (e.g. institutional, schedular, budget and policy issues).

Pros:

a. Such a program would include all regulatory related issues.

b. It is more likely that issues related to the program with significant delay potential would be identified.

Cons:

a. More resources would be required to implement this option.

b. The issue tracking process, while not necessarily more complex, would be much larger.

RECOMMENDATION

I recommend that we pursue Option 2 above and seek to establish input to a comprehensive licensing and regulatory issue identification and tracking function. The detailed procedures for operation of the Issue Tracking function will be coordinated with the Project Offices to minimize difficulties in implementation.

Attachment 4

Scope of the Commitments Tracking Function

BACKGROUND

As part of the OGR Licensing Support System (LSS) being developed by OCRWM, it has been proposed that the Commitments Tracking function record all formal commitments that DOE has made to NRC, the States or the Tribes relating to repository licensing and permitting. The work plan (major actions and responsibilities) to fulfill each commitment and references to documentation of fulfilled commitments would also be included. The purpose of this document is to analyze and recommend the scope of the Commitments Tracking function.

DISCUSSION

During the course of pre-licensing and licensing activity, OGR will make commitments concerning compliance with regulations in order for the program to progress in the regulatory sense. To the extent that these commitments are made in response to regulatory issues, a means of tracking the commitments will be necessary to assure that activities are initiated to honor them. The commitments may, for example, involve design changes, promises to perform repository operations in a certain manner (operating procedures or administrative procedures), or promises to provide information. The type of commitments to be tracked, and who is authorized to make them, will be defined in detail during development of the procedures governing the operation of the commitment tracking function. However, it is clear that every commitment made by every individual in the program will not need to be tracked. The commitments that we are primarily interested in are those that have the potential to affect the repository licensing process.

Program progress in areas other than regulatory compliance will also depend on proper action being taken to meet commitments. For example OCRWM's credibility will in part be measured by how it meets commitments in the institutional area. Smooth institutional relations will contribute to the likelihood of implementing the requirements of the NWPA as intended. Accordingly, another approach in the development of a Commitment Tracking system could be to identify and monitor all major program commitments.

Several commitment tracking processes are already in place in the OGR Project Offices. The commitment tracking process being discussed here for inclusion in the LSS is intended to define the respective roles of headquarters and the Project Offices in making and meeting repository licensing commitments, and to provide an overall OGR program commitment tracking capability.

The methods of interaction between the LSS commitment tracking function and those being operated by the Project Offices will be developed during preparation of the LSS commitment tracking procedures.

OPTIONS

The following conceptual options for resolution of the questions on the scope of the Commitments Tracking function have been considered:

1. Track Commitments to Regulatory Agencies Only

Under this option, only commitments made to regulatory agencies (Federal, state and local) would be tracked.

Pros:

a. From a licensing perspective, all commitments required to obtain necessary licenses and permits would be highlighted and their chance of being overlooked minimized.

b. Commitments made to regulatory agencies by various Project Offices could be compared for consistency and therefore assist integration of effort.

c. Such a process could also track commitments made to the Department by regulatory agencies. This will assist the Department in its planning and integration activities.

Cons:

a. A commitment tracking process narrowly focused on regulatory issues could potentially ignore equally important programmatic concerns such as those in the institutional area.

2. Track Commitments to All Regulatory Agencies, States and Indian Tribes

Under this option, commitments made to regulatory agencies (Federal, State and local) and parties identified in the NWPA with legal standing (States and affected Indian Tribes) would be tracked.

Pros:

a. All pros from Option 1.

b. All commitments to recognized parties of the NWPA will be highlighted, assisting the Department to build its credibility.

c. Commitments made to regulatory agencies, to the extent they are related to commitments made to States or Tribes, can be more easily coordinated. This will enhance consistency, aid credibility and promote confidence.

d. Including States and Tribes in the commitment tracking process should contribute to the spirit of the consultation and cooperation process.

Cons:

a. Commitments to regulatory agencies and to States/Tribes may, in many instances, be different in nature. This could result in the licensing process and staff being used for purposes that are remote from actual licensing functions.

3. Track All Major Program Commitments

Under this option, all major repository program commitments, encompassing regulatory agencies, States and Tribes, and all DOE program elements and their contractors, would be tracked.

Pros:

a. All pros from Options 1 and 2.

b. Commitments made by the various project offices and headquarters could be analyzed for redundancy and, therefore, assist in integration and efficiency of effort.

Cons:

a. Same as for Option 2, Con (a).

b. The commitment tracking process would be considerably more extensive.

4. Combine Commitments Tracking Function With Issues Tracking Function

Under this option, there would not be a separate commitments tracking function. Rather, the issues and commitments

tracking functions would be combined.

Pros:

a. There would be one less element comprising the LSS, thereby theoretically simplifying it and reducing its cost.

Cons:

a. The procedures for handling issues (which may be raised by individuals within or without the program, and which exist whether we like it or not) and commitments (which may only be made by a specified management hierarchy within the OGR program and which are to a great degree subject to our volition) would be greatly complicated.

(Note: The feasibility of this option will be automatically tested through development of the procedures for identification and handling of Issues and Commitments. If the procedures have substantial common aspects, then we will consider combining the two functions. On the other hand, if it turns out that they do represent different aspects of the process of dealing with the licensing/regulatory process, then little is lost by keeping them separate. The actual records in either case will almost certainly reside in the same computer database as the archives records and all that is added by having a separate commitments function is the addition of a separate commitments sorting algorithm, plus the separation of the paper reports for the two classes of items.)

RECOMMENDATION

I recommend that we pursue Option 2 above. The detailed procedures for operation of the Commitment Tracking process will be coordinated with the Project Offices to minimize difficulties in implementation.

Attachment 5

Scope of the Regulations Access Function

BACKGROUND

It has been proposed that the Licensing Support System include a function to provide access to the regulations that the repository program must abide by, supplemented by analyses of the intent of key, questionable portions of the regulations, references to documentation of the issues that arise from the regulations and to documentation demonstrating compliance with the regulations. The purpose of this document is to analyze and recommend the scope of the regulations access function.

DISCUSSION

As part of its responsibility to implement the requirements of the NWPA, OCRWM is committed to following all applicable regulatory requirements. Such requirements will define the ground rules by which all activities important to safety, waste isolation or the protection of the environment will be guided. They will provide a regulatory benchmark against which proposed and completed activities can be judged for necessity, timeliness, level of detail, effectiveness, consistency and, most importantly, compliance.

The purpose of the regulatory access function is to identify, collect and analyze key, questionable portions of the regulatory requirements facing OGR. Of primary interest would be those statutes, regulations, orders and guides on issues related to nuclear activities, air quality, water quality, environmental assessments, cultural resources, ecology/wildlife protection, land use, noise control, waste disposal, aesthetics, occupational health and safety, and transportation.

OPTIONS

The following options for definition of the scope of the Regulations Access function have been considered:

1. Federal Requirements Only

   Under this option, all applicable Federal statutes, regulations, orders and guides would be collected and key, questionable portions would be analyzed.

   Pros:

   a. This option would allow OGR to focus on the most prominent standards.

b. The extent of contents will be limited.

Cons:

a. A set of regulations directed only at Federal requirements will miss important State and local requirements. The latter are most important when State and local permits are required to allow site/siting activities to proceed.

2. Federal and State Requirements Only

Under this option, all applicable Federal and State statutes, regulations, orders and guides would be collected and key, questionable portions would be analyzed.

Pros:

a. Improves program's ability to ensure compliance with State requirements.

b. By analyzing State requirements, DOE will be in a better position to carry out its consultation and cooperation responsibilities with the States.

c. State requirements, especially in the environmental area, could be much more restrictive than their Federal counterparts. This option would help identify all such potential conflicts.

Cons:

a. A set of regulations directed only at Federal and State requirements, while capturing most items, will still be at risk relative to local requirements. The latter are most important for local permitting needs.

3. Federal, State and Local Requirements

Under this option, all applicable Federal, State and local statutes, regulations, orders and guides with which DOE must comply would be collected and key, questionable portions would be analyzed. "Applicable State and local statutes and regulations" refers to those which DOE has determined it must comply with as the result of an express Federal waiver of sovereign immunity.

Pros:

a. All of the pros of Option 2 for local as well as Federal and State requirements.

Cons:

a. The compilation of regulations will be relatively more extensive.

RECOMMENDATION

I recommend that we pursue Option 3 above, and seek to establish a comprehensive Federal, State and local regulations access capability. Although this option leads to a relatively more extensive total set of contents, such regulations must be complied with. If you agree with my recommendation, we will proceed to develop the Regulations Access function on this basis.

Attachment 6

Licensing Schedule Networks

BACKGROUND

It has been proposed that the Licensing Schedule Networks consist of computer updatable schedule networks for the repository licensing and permitting process. The schedules will be a subset of the overall OCRWM program schedule. The purpose of this document is to analyze and recommend the contents of the Licensing Schedule Network.

DISCUSSION

The Licensing Schedule Network is to be developed to allow some or all major and supporting OGR regulatory-related activities to be laid out and analyzed. The schedule network can be developed to identify the relationships among (1) schedule dates and sequences mandated via legislation and regulation (NWPA, 10CFR2, 10CFR60 and State regulations), (2) regulatory document preparation activities necessary to achieve those milsstone dates, and (3) the engineering and testing activities that will yield the data required to prepare those documents. OGR will utilize the network to lay out the sequence of mandated regulatory deliverables and, by working back in time, establish the preparation and supporting substructure that must be in place. This will allow the relationships between regulatory and technical activities to be highlighted and firmly established.

Computerized licensing schedule networks will also allow OGR to analyze "what if" delay scenarios. In a program such as this, the licensing and permitting schedule is on the critical path. It is important to understand how that path can be controlled.

The schedule network also promotes planning and prioritization of regulatory-related activities. Because the network displays the relationships between regulatory effort and engineering effort, the latter's role in the process is also highlighted, contributing to engineering's role in, and recognition of its manpower needs to support, the licensing process.

OPTIONS

The following options for resolution of the questions on the scope of the Licensing Schedule Network have been considered:

1. Regulatory Activity Schedules Only

   Under this option only regulatory milestones and activities conducted by the regulatory groups would be displayed.

Pros:

a. The number and sequence of regulatory deliverables will be highlighted, helping to assure that important regulatory activities will not be overlooked.

b. The durations of activities necessary to meet milestones can be analyzed for shortcuts to maintain overall OCRWM schedules.

c. Critical path activities can be identified and schedule sensitivities determined.

d. Manpower requirements for regulatory activities can be forecast.

Cons:

a. Engineering, testing and other technical activities would not be displayed, obscuring the supporting relationships that exist between technical and regulatory activities. For example, efforts to identify the total menu of regulatory requirements should be completed prior to the start of conceptual design engineering and in-situ testing to assure that those activities, when completed, will yield the data necessary to demonstrate compliance with all applicable regulations. Additionally, it is critical that such data be available in time to support major regulatory document preparation milestones.

b. This database would not take advantage of schedule systems currently under development to support overall program management needs.

2. Schedules of All Repository Activities

Under this option all repository activities will be loaded into the system.

Pros:

a. Regulatory milestones and engineering/testing milestones will be displayed concurrently, allowing a detailed analysis of relationships and the supporting activities necessary to satisfy those relationships.

b. Manpower requirements for licensing activities and engineering support can be forecast.

c. These comprehensive schedules are currently under development to support overall program management needs.

d. Same as for Option 1, Pros (b) and (c).

Cons:

a. Not all repository activities have a bearing on licensing and permitting milestones. Therefore, a schedule network that does not attempt to discriminate between "all repository activities" and "all repository activities necessary to support the licensing process" will be unnecessarily cluttered for regulatory purposes.

b. The schedule networks intended to support overall program management may not display information to the minute detail necessary for regulatory activities.

3. Regulatory and Regulatory Related Activities

Under this option only those engineering, testing and administrative activities necessary to support regulatory compliance would be displayed on the system, together with activities conducted by the regulatory compliance groups.

Pros:

a. Regulatory milestones and only those engineering/testing/administrative milestones supporting regulatory compliance would be displayed, allowing a more efficient analysis of interrelationships and the supporting activities necessary to satisfy those interrelationships.

b. Same as for Option 2, Pro (b) and Option 1, Pros (b) and (c).

Cons:

a. Same as for Option 1, Con (6).

4. Use the OGR Program Schedule Networks Rather Than Developing Separate Licensing Schedule Networks

Under this option, the complete OGR program schedule networks would be analyzed and used by the OGR licensing staff, rather than developing a separate licensing schedule network. Errors identified in the licensing logic or

policies, as displayed by the program schedule networks, would be identified to program management and coordinated through the existing change control procedures for correction. Areas where there is insufficient detail would either be completed by the licensing staff or recommended for further work by the program scheduling staff.

Pros:

a. The efforts being put into establishing a program wide schedule networking capability would be used directly, avoiding the need to set up a separate licensing schedule network capability.

b. Licensing activities can be highlighted by showing them as separate detailed schedule elements within the overall repository schedule.

c. Option 1, Pros (a), (b), (c), and (d).

d. Option 2, Pro (a).

Cons:

a. The licensing activities will be harder to separate out for display. This is not expected to be a significant disadvantage for the normal system users.

RECOMMENDATION

I recommend that Option 4 be adopted. I consider it appropriate at this time to work within the framework of the overall OGR schedule networking system being developed. This will be an asset to the integration function as well. If, at a later time, it is concluded that the overall OCRWM scheduling system does not meet regulatory needs, Option 3 will be reconsidered. If you agree with my recommendation, I will not develop a separate Licensing Schedule Network, but will continue to work within the overall OCRWM scheduling activity.

Attachment 7

Access to the Licensing Support System Databases

BACKGROUND

This is one of seven separate decision documents prepared to discuss the development of the OGR Licensing Support System (LSS). The other documents discuss the recommended scope and contents of each of the databases and/or functions of the LSS. This document is intended to discuss the degree of access to be allowed to the various databases and/or functions.

DISCUSSION

The LSS will be an OGR program wide system structured to serve the needs of a large number of users. It will contain information that may be considered sensitive, privileged or confidential. Notwithstanding that the OCRWM program is very much a public program with specific requirements placed on DOE by the NWPA to work cooperatively with public and private entities, the Department must decide what policy it will follow with respect to allowing public access to privileged information, should any be contained within the LSS.

For each of the LSS databases and/or functions, options such as the following must be considered: should the data, all or part, be accessible to DOE only, DOE and regulatory agencies only, all parties to the licensing hearing (which would include members of the general public granted standing as intervenors) or the public at large? The public at large, for purposes of this memorandum, is defined to include States, Indian tribes and the general public. References to DOE are intended to refer to DOE headquarters, the DOE Project Offices, and contractors of any part of DOE.

For each option under consideration, the Department must weight the costs and benefits of full, partial or no public disclosure of the information generated by the repository program.

Good communications between the regulator and the regulated provide the greatest assurance that NWPA schedules can be met because it helps assure that each party fully understands what is expected of it. For a first-of-a-kind repository design being evaluated under an untested regulation, the need for good, open communication is even more important.

Good communication is also important between all parties of the licensing hearing process. By "parties to the licensing hearing", we mean the NRC, the States and Indian tribes, and selected representatives of the public, if admitted.

Another consideration to be weighed is not to whom, but when access is made available. By when we mean at what point in the licensing process. This could be relatively late in the process, i.e. at the time when (or some suitable interval before) the hearing process commences, or essentially immediately upon loading of the information into the LSS. The question of "when" is very important. DOE will likely have to make the assumption that most information it generates will be available to other parties sooner or later. It is in DOE's interest to raise issues early in the process, not to have them raised at the eleventh hour.

The final consideration is whether to allow access by the public at large. Arguing for full public access to LSS data would be those who maintain that the OCRWM is administering a public program for the public good, and full public participation is in keeping with the spirit of the NWPA. The opposite view might be that the licensing process is open to the public at various well-defined points and DOE need not accommodate all those who would demand a greater role than the law currently provides, due to the disruption and extra work that full access would entail.

OPTIONS

The following options for resolution of the questions of degree of public access to LSS data have been considered.

1. Access by DOE Only

   Under this option, the LSS database would be created for DOE's exclusive use. NRC, parties to the licensing hearings and the general public would not have access.

   Pros:

   a. Information would be harder to obtain (but not impossible) for non-DOE program participants, lessening the potential for unnecessary distractions.

   b. NRC will likely create its own LSS database, increasing the likelihood that two independent efforts will identify all important issues requiring resolution.

   Cons:

   a. Valuable early interaction between the DOE, NRC and State regulatory agencies and members of the public working for the national good would be hampered.

b. An opportunity to help educate interested parties to the overall comprehensiveness of DOE's program will have been hampered.

c. NRC would likely create its own LSS, at extra expense to the public being served by nuclear utilities.

d. The spirit of consultation and cooperation will be questioned.

e. The LSS would not be available to assist NRC in the early identification and resolution of licensing issues.

2. Access by DOE and Regulatory Agencies Only

Under this option, the LSS database would be created for DOE's and Federal and state regulatory agency's mutual use, subject only to the rules established for access to "privileged" information. They would have access to data in the system as soon as the data is loaded. Other parties to the licensing hearings and the general public would not have access.

Pros:

a. Same as for Option 1, Pro(a).

b. Would create better communications between regulatory agencies and DOE, increasing the likelihood of face to face meetings and mutual understanding of key issues.

c. Would negate the need for NRC to develop its own LSS, conserving public funds, provided NRC could place material into the system, not just draw from it.

d. Highlighting issues and key schedules to NRC will encourage NRC to staff to keep pace with DOE's needs.

Cons:

a. Valuable early interaction between DOE and members of the public working for the national good would not be as readily facilitated. While the public would still have the opportunity to comment on major DOE documents, other important documents would not be as easily accessible.

b. Same as for Option 1, Cons (b), (c), and (d).

3. Access by All Parties to the Licensing Hearings

Under this option, the LSS database would be accessible by DOE, Federal and State regulatory agencies and intervenors granted standing by the Atomic Safety and Licensing Board, subject only to the rules established for access to "privileged" information. Since NRC and DOE will certainly be parties to the proceeding, their access to LSS is from its inception. For others who will become parties to the hearings, undeterminable at this time, access to LSS would be made available at the time legal standing is granted.

Pros:

a. Same as for Option 1, Pro (a), except that the potential for unnecessary distraction will be delayed until later in the process.

b. Making the Archives database accessible to all participants in the licensing hearings (including program opponents) would make it much harder for program opponents to "spring" new issues at the eleventh hour.

c. Same as for Option 2, Pros (b), (c) and (d).

Cons:

a. Same as for Option 2, Con (a).

b. Same as for Option 1, Cons (b) and (d).

c. The total value of the LSS in the identification of issues may not be exploited when public access is restricted until the hearing process. This has the potential for delaying the identification of numerous issues relatively late in the process.

4. Selected Access by All Parties to the Licensing Hearings

Under this option, the Archives, Regulations, and Key Documents data would be accessible by DOE, Federal and State regulatory agencies and intervenors granted standing by the Atomic Safety and Licensing Board, subject only to the rules established for access to "privileged" information, as soon as the data is loaded into the LSS. The Issues and Commitments data would be accessible only to DOE and NRC. The Schedule Networks would only be accessible by DOE. However, periodic reports on the issues and commitments being tracked by the program and on the program schedule

networks would be entered into the Archives database.

Pros:

a. This option would simplify the use of "stand alone" LSS terminals, such as those where each group to be given access to the LSS is given a set of optical disks with the program information on them, along with the hardware to access the information on the disks. The disks would be supplemented periodically with additional disks as new information is added to the system.

b. Making the Archives database accessible to all participants in the licensing hearings should make the licensing hearings more effective.

c. Same as for Option 1, Pro (a), except that the potential for unnecessary distraction will be delayed until later in the process.

d. Same as for Option 2, Pros (b), (c) and (d).

Cons:

a. Same as for Option 2, Con (a).

b. Same as for Option 1, Cons (b) and (d).

c. The total value of the LSS in the identification of issues may not be exploited when public access is restricted until the hearing process. This has the potential for delaying the identification of numerous issues relatively late in the process.

5. Access by the Public at Large

Under this option, the LSS database will be accessible by all entities, subject only to the rules established for access to "privileged" information, as soon as the information is loaded into the LSS. We would mitigate the resource requirements for this degree of access by providing access terminals to the public at large only in our "public document rooms".

Part of our rationalization for considering this option is the realization that other groups will be able to gain access to the LSS through contacts among the States, Tribes or other entities to whom we intentionally give access. As a result, we consider that it is preferable to openly give such groups access, thus placing the Department in the

position of taking the initiative to openly allow a degree of access that would probably exist otherwise anyway, through uncontrolled and unreliable mechanisms.

Pros:

a. Valuable early interaction between the DOE, NRC, state agencies and members of the public working for the national good will be enhanced.

b. An opportunity to help educate interested parties to the overall comprehensiveness of the DOE program will be enhanced.

c. The ability to assist OGC and NRC in the identification of issues would be enhanced.

d. NRC would not likely create its own LSS, thereby conserving funds.

e. More information would be available for critical review by those outside DOE, thereby increasing the assurance that no relevant considerations are overlooked.

Cons:

a. The greater the volume of information made available, the greater the potential for abuse and delay of the licensing process by some opponents of the program.

b. Resource requirements for equipment will be greatest under this option.

6. Selected Access by the Public at Large

Under this option, the Archives, Regulations, and Key Documents data would be accessible by all entities, subject only to the rules established for access to "privileged" information, as soon as the data is loaded into the LSS. Here again, we would mitigate the resource requirements for this degree of access by providing access terminals to the public at large only in our "public document rooms". The Issues and Commitments data would be accessible only to DOE and NRC. The Schedule Networks would only be accessible by DOE. However, periodic reports on the issues and commitments being tracked by the program, and on the program schedule networks would be entered into the Archives database.

As with option 5, part of our rationalization for considering this option is the realization that most, if not all, groups that are likely to oppose the repository program will be able to gain access to the LSS through contacts among the States, Tribes or other entities to whom we intentionally give access. As a result, we consider that it is preferable to openly give such groups access, thus placing the Department in the position of taking the initiative to openly allow a degree of access that would probably exist otherwise anyway, through uncontrolled and unreliable mechanisms.

Pros:

a. Same as Option 5, Pros (a), (b), (c), (d) and (e).

b. Same as Option 4, Pro (a).

c. Same as Option 2, Pros (b), (c) and (d).

Cons:

a. Same as Option 4, Con (c).

b. Same as Option 5, Cons (a), (b) and (c).

RECOMMENDATION

I recommend that we pursue Option 4 above. If you agree with my recommendation, we will proceed to design the LSS to allow access to the LSS data as recommended herein.