SRS CAB Wins EPA Award

In Jacksonville, Florida, on June 21, 2007, I had the distinct pleasure of receiving, on behalf of the Savannah River Site (SRS) Citizens Advisory Board (CAB), the Environmental Protection Agency’s National Citizen’s Award at their 10th National Community Involvement Conference. I felt very proud being part of a group that is truly committed to public participation. The Savannah River Site CAB has over a dozen years of outstanding collective experience where the most complex type of problems involving nuclear and chemical wastes is discussed with respect and trust. Together the U. S. Department of Energy, the U. S. Environmental Protection Agency, the South Carolina Department of Health and Environmental Control, the Georgia Department of Natural Resources, many Savannah River Site personnel and the CAB have created a platform where dialogue can flow and the exchange of information and advice occurs. To be part of an organization that receives national notice for its productive, inclusive, and harmonious public involvement is very affirming.

I appreciated the opportunity to be associated with a community built upon a shared commitment to the safe environmental management of the Savannah River Site.

Donna Antonucci

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The mission of the SRS CAB is to provide informed and timely recommendations to DOE concerning decisions that affect SRS in areas of environmental restoration, waste management and related activities.
On June 13, 2007, ten members of the CAB attended the A-Area Powerhouse groundbreaking followed by a tour of selected nuclear material areas. These events were followed by the Strategic and Legacy Management Committee and the Nuclear Materials Committee joint meeting, which occurred the evening before.

CAB members attending the tour were Donna Antonucci, Manuel Bettencourt, Leon Chavous, Mary Drye, Judith Greene-McLeod, Stan Howard, Bob Miesenheimer, Joe Ortaldo, Karen Patterson, and Alex Williams. Alex, at first, complained because he thought this was going to be his long sought-after trip to Las Vegas, but once we began the tour, he soon calmed down.

Topics presented at the joint committees’ meeting prepared the CAB members for Wednesday’s activities, which started with the groundbreaking for the new steam generation plant in A-Area. The existing steam generation plant was built in 1953, uses fossil fuel, and currently provides steam to the Savannah River National Laboratory, Savannah River Ecology Laboratory, and the Dynamic Underground Stripping (DUS) Project.

This project is the first application of DOE’s Alternative Energy Initiative and involves “innovative alternative third-party financing” which will result in a savings of approximately $1.5 million to the government and the use of biomass (wood products) fuel, mostly from SRS, to create the needed energy. The wood was provided by the U.S. Forest Service from discarded rubble produced during timber harvesting. Fittingly, the groundbreaking actually involved the “shoveling” of symbolic woodchips to signify this new attempt at using energy materials more efficiently.

Following the groundbreaking, attendees viewed displays, including some SRS alternative energy vehicles.

When we arrived at H-Canyon, we were able to closely view the significant, reinforced concrete construction of the massive building. Inside, we saw how material is remotely handled as it is passed from one cell to another for processing. Of particular interest was the simple, yet effective process, showing how the complicated myriad of electrical and hydraulic connections ensured that materials are safely handled and transported.

We drove by F-Canyon which was deinventoried last year and is being maintained in “cold and dark” status pending a National/DOE decision concerning possible future use. The only F-Canyon area still in use is the Truck Well, which is now used to rehearse and test equipment needed to off-load and handle research reactor rods when they arrive at SRS.

Our apologies to the staff for having to keep count of how many of us had gone to the bathroom and whether or not anyone was abandoned in one of the latrine stalls.

At the end of the day, we felt good about, and were satisfied with, the measures we observed being used to ensure that operations at the SRS are conducted safely and securely.

“Most impressive was the 3 million gallon “swimming pool” of very clear water which is used to safely store the rods until they can be processed for permanent disposition.”

Manuel Bettencourt
**Recent Recommendations Highlighted**

<table>
<thead>
<tr>
<th>Recommendation 246 - Supplemental Environmental Impact Statement (EIS) for Surplus Plutonium Disposition at SRS (adopted 5/22/07)</th>
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<tbody>
<tr>
<td>The CAB recommends that DOE include the following analysis in the Supplemental EIS for Surplus Plutonium Disposition at the SRS:</td>
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<tr>
<td>1) The volume, type and constituents of each waste stream being generated by the disposition facilities.</td>
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<td>2) The possible treatment options for each waste stream.</td>
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<td>3) The preferred and selected treatment options for each waste stream.</td>
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<tr>
<td>4) The basis or reason for the selection of each identified treatment option.</td>
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<tr>
<th>Recommendation 247 - Information for the Administrative Law Court (adopted 5/22/07)</th>
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<td>The CAB questions the Request for Contested Case Hearing before the Administrative Law Court on the Decision of the South Carolina Department of Health &amp; Environmental Control (SCDHEC) to issue a Modified Industrial Solid Waste permit for the SRS Z-Area Saltstone Disposal Facility. To minimize the impacts to the overall schedule and reduce the risks associated with storing waste in the aging tanks, and that a review of the merits of this case be conducted in the most expeditious manner as possible. If a review cannot be performed in a timely manner, then the CAB requests that the stay be lifted so operation of the &quot;interim&quot; processing of salt can continue while legal decisions related to this proceeding are being considered.</td>
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<th>Recommendation 248 - P Reactor End State Options (adopted 7/24/07)</th>
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<td>The CAB is highly interested in the ultimate end state of P Reactor. The SRS CAB supports public involvement in the process for the P Reactor End State performance assessments and decision-making. This decision will set the example for other hardened facilities at SRS. As stated in CAB's previous Recommendation #233, for stakeholder input to truly be part of the decision-making process, public involvement needs to be ongoing and stakeholders need to be kept abreast of all alternatives being considered. The SRS CAB recommended a series of public workshops on the P Reactor End State process and presentations on the performance assessment modeling strategy. In DOE's response to this recommendation, a commitment was made to provide both of these early public involvement opportunities.</td>
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To ensure early public involvement concerning the P Reactor End State process, the SRS CAB offers the following recommendations: |

1) DOE-SR host, with participation from the South Carolina Department of Health and Environmental Control and the Environmental Protection Agency several well-publicized public workshops on the P Reactor End State process. The first workshop should be conducted between September and October 2007 and discuss the topic of the P Reactor performance assessment modeling. Additional workshops should occur every two to three months and discuss topics such as End State Options under Consideration, the In-Situ Decommissioning Concept, the Cost/Benefit Evaluation, and funding needs. |

2) DOE-SR provides a definitive schedule and agenda topics for each workshop discussed above by August 15, 2007. |


After reviewing the conclusions of the Old Radioactive Waste Burial Ground Focus Groups in 2001, the CAB’s position was to oppose retrieval of alpha buried wastes from the ORWBG. This opposition centered on the fact that any attempt to exhume the waste would be too dangerous to site workers and the environment and cost prohibitive. Furthermore, such an excavation would also create an additional large volume of a secondary waste stream requiring disposition. The rationale that supports that position also informs this similar situation of inadvertent disposal of some TRU wastes. In this case (the inadvertent TRU waste disposal in E-Area trenches), the SRS CAB recognizes the limited quantity of waste that would require retrieval and the relatively insignificant and minimal impact of the additional radionuclides to the E-Area PA limits. In addition, the actual quantity of transuranic isotopes in the waste is suspect due to the limited analytical technology at the time of generation and the use of conservative engineering knowledge to estimate TRU concentrations in waste; therefore, the actual classification of the waste (as TRU with concentrations greater than 100 nCi/g) is questionable. The waste under consideration in this current action may actually be better contained and exhibits lower risk than that disposed of between 1955 and 1970 in the ORWBG. Before the SRS CAB could support any corrective action related to the inadvertent TRU waste disposal, the SRS CAB needs additional information related to the risks, costs, safety, and environmental impacts of both the retrieval option and the disposal in place option. |

Before a final decision is made by DOE on which option (retrieval vs. disposal in place) will be implemented, the SRS CAB requests the following on or before November 16, 2007: |

1) DOE-SR conduct a thorough evaluation of the risks, costs, safety, and environmental impacts associated with both options, justify how each option meets DOE orders and regulations, demonstrate how each option is protective of the public and the environment, and share the results with the SRS CAB. |

2) DOE-SR identify the results from the Root Cause Analysis and the necessary corrective actions they will take to prevent the recurrence of any future inadvertent TRU waste disposals and share these results with the SRS CAB.
The Citizens Advisory Board (CAB) considers the “legacy” liquid waste in the tank farms to represent the greatest relative risk to public health and safety associated with the Savannah River Site. The Board reviewed and provided comments to the State’s permit modification that was challenged by petitioners. They expressed their public support for the resumption of operations of the “interim” processing of salt, stating that the State’s permit would allow the Department of Energy to commence removal of waste, thereby reducing the relative potential risk to public safety. The Board strongly disagreed with the petitioners indicating that delay during the Salt Waste Processing Facility design, construction and initial operation was not in the overall public’s interest. The Department and the State were able to reach an agreement with the petitioners that was approved by the state Administrative Law Court Judge to allow the Department to resume the interim salt waste processing, which had been suspended for about five months. The Board’s consistent efforts through phone calls, public comments at meetings, frequent communications with DOE attorneys, and a position paper submission were significant in influencing the resolution 60 days earlier than expected. The Board members were actively involved in the resolution efforts.

Saltstone Facility Modified Permit Agreement Reached

Saltstone Disposal Facility

CAB Receives Cold War Artifacts Preservation Briefing

On September 25, 2007, the CAB Members received an informative briefing on Cold War artifacts preservation efforts ongoing at the Savannah River Site (SRS).

Mr. Nick Delaplane, DOE Director Office of Support Services, and Caroline Bradford, Curator of the new SRS Curation Facility, spoke about the accomplishments made in 2006 and ongoing activities planned for the new Curation Facility.

Mr. Delaplane stated that with the support of the Heritage Foundation, SRS has published the document “SRS at 50” which is available on a CD, as well as, a hardback publication. In addition, he said, the historic preservation includes developing an artifact loan program for the Aiken County Historical Museum.

Ms. Caroline Bradford, SRS Curator, stated that there are currently 375 artifacts cataloged and protected at the Curation Facility. The facility continues to identify and relocate artifacts. Ms. Bradford gave a demonstration of small artifacts at the September meeting.

Welcome New CAB Members

Dalton Brannen
Dalton is a professor, Business Administration, at Augusta State University in Augusta, GA. He has studied nuclear engineering and radiological health. He has work experience in consensus-building and conducting and participating in meetings and has highly developed writing and organizational skills. Dr. Brannen has achieved a Bachelor of Science, a Master of Business Administration, a Doctorate in Management and Human Resources and is a certified professional in Human Resources. Dr. Brannen resides in Augusta, GA.

Lee Harley-Fitts
Lee is the Director of the Allendale County Department of Social Services. She is a member of Allendale County Alive and has served on the University of South Carolina-Salk Partnership Advisory Board. Ms. Harley-Fitts holds a Bachelors of Arts degree and resides in Allendale, SC.

Farewell and Thank You to Departing Members

Barbara Morningstar-Paul
Barbara Morningstar-Paul

Terri Chaput
Terri Chaput

“Your time and work with the CAB has been sincerely appreciated.”
The SRS Citizens Advisory Board’s Vice Chair, Donna Antonucci, and Waste Management Committee Chair, Joe Ortaldo, attended the Environmental Management (EM) Site Specific Advisory Board (SSAB)’s semi-annual meeting September 26-27, 2007 in Paducah, Kentucky. The meeting was hosted by the Citizens Advisory Board for the Paducah Gaseous Diffusion Plant (PGDP) and began with a tour of the Plant. Participants included Chairs, Vice Chairs, Co-Chairs, other EM SSAB members, U.S. Department of Energy (DOE) Headquarters (HQ) and field staff, site coordinators, EM SSAB administrators, and support staff.

Participants attended a workshop on Communication, Cooperation and Public Participation by David Abel- son, Co-author of the report to Congress, “Politics of Cleanup.” Mr. Abelson told the group that the report, requested by Congress, focused on the complexity and numerous technical, policy, and political issues involved in remediating facilities.

Each EM SSAB highlighted current issues facing its respective board and site. The SRS CAB’s top issues presented were:

- **Tank Closure**
  - SRS has 49 tanks containing approximately 36 million gallons radioactive liquid waste. The Salt Waste Processing Facility, Tank Farm Operations, and the DWPF/Saltstone Operations must be in operation to meet the Federal Facilities Agreement schedule for closure of these waste tanks.

- **Plutonium Disposition Decisions**
  - DOE’s consolidation and disposition plan for plutonium is to bring the plutonium to SRS from across the complex. Once the material is consolidated at SRS, the Department’s current plan for disposing of the surplus plutonium involves the use of three SRS facilities: the Mixed Oxide (MOX) Fuel Fabrication Facility; the existing H-Canyon Facility; and a proposed new vitrification plant. The SRS CAB wants to ensure that the plutonium has an exit strategy and will safely leave the SRS for permanent storage elsewhere.

- **P-Reactor End State Options**
  - The end state options for the P-Reactor are currently being assessed in the Performance Assessment Modeling and In-Situ Alternatives Study.
  - The defining central issue is whether to demolish the entire facility or some portion of the facility.
  - SRS wants others to recognize that this process used to decommission the P-Reactor may be transferable to other sites.

James Rispoli, Assistant Secretary for Environmental Management (EM-1) extended his personal gratitude to those who volunteer to serve on the EM SSAB and contribute to the EM program. He told the group that the top three issues from each site are discussed at leadership meetings.

Cindy Rheaume, Director, Office of Budget, spoke on External Involvement and Input to the EM Budget Process. She said the initial guidance issued February 1, 2007, outlined how they could be involved in the budget decision-making process, but it was confusing to many SSAB Members. It was not clear what and when the budget information could be released. A recommendation was made to issue clarifying guidance that provides examples of the types of information to be shared; outlines at what point the EM budget request becomes embargoed, and to provides a timeline for involvement.

Members heard a discussion on Pre-1970 Transuranic (TRU) Waste by Karen Guevara, Director of the Office of Regulatory Compliance, and Tom Longo of the National Nuclear Security Administration. At this time, Mr. Longo stated, General Accounting Office (GAO) offered no recommendations on how to handle the buried TRU problem any differently than what DOE EM is currently doing. A GAO document on the subject is available at www.gao.gov (document number GAO-07-761). Mr. Ortaldo said the SRS CAB developed a focus group a few years ago that addressed leaving the buried waste in place and prepared a report that supported the actions taken.

As a product of the Chairs meeting, the attendees agreed to draft two letters. The first letter recommended that long term stewardship be incorporated into new EM projects and legacy waste decisions. The second letter requested additional participation in the EM budget process, including a validated baseline for each site with a critical path schedule at a level showing the status of major projects within the Project Baseline Summary.
On August 1, 2007, the SRS CAB Chairperson, Karen Patterson, appeared before the Subcommittee on Investigations and Oversight and the Subcommittee on Energy and the Environment of the House Committee on Science and Technology to provide the public’s view regarding the Department of Energy’s Support for the Savannah River Ecology Laboratory (SREL).

Ms. Patterson’s testimony focused on three points as she explained the overall support for SREL and the concerns about future funding:

1. the value of SREL to the local communities,
2. the value of SREL to DOE, and
3. the value of SREL to the country.

To explain SREL’s value to the local communities, Ms. Patterson cited the the CAB’s previous Recommendation #240:

- the public considers SREL to be an independent and credible source of information about environmental issues at SRS and elsewhere
- SREL’s potential to support clean-up and remediation across the DOE weapons complex and throughout the nation

As for the value of SREL to DOE, Ms. Patterson stated it was “pure and simple…[it] does not cost DOE money, it saves DOE (and the American taxpayer) money.” She gave an example of how less than $1 million of SREL research on Par Pond saved billions of dollars for SRS.

The value of SREL to the country was illustrated by explaining how SREL has trained thousands of graduate students; touched tens of thousands of students, parents and teachers through outreach; and is recognized for its international scientific support and cooperation.

In conclusion, Ms. Patterson urged Congress to restore funding and find a way to ensure SREL’s future. She left the subcommittee with this thought:

SREL: Cost to DOE….$4.5 million
Value to local communities, DOE, and the nation….PRICELESS!

### P-Reactor Recommendation Results

In response to the SRS CAB’s Recommendation Number 248, DOE-SR held a public information workshop to discuss P-Reactor End State on October 16, 2007, at the Aiken Technical College Amphitheater. The workshop was the first in a series to provide public information and solicit stakeholder input on the P-Reactor end-state decision.

The Department of Energy is currently deactivating the P-Reactor at the Savannah River Site. Upon completion of deactivation, the reactor will undergo decommissioning. The workshops provided local residents with information about the Department’s reactor end-state options, reactor fundamentals, assessment modeling approach, and a regulatory perspective.

P-Reactor is one of five production reactors at SRS and was the site of the cutting-edge neutrino research. In 1956, Dr. Clyde Cowan, Jr., and Dr. Frederick Reines used P Reactor to confirm the existence of the free neutrino, a subatomic particle of extremely small mass. As a result of this work, Dr. Reines won the 1995 Nobel Prize in Physics. In addition to the awarding research, P-Reactor produced plutonium and tritium for national defense. Built from 1951-54, it was the second of the five reactors at SRS to come on-line, running from initial start-up, February 20, 1954, until final shut-down in 1991.

The next P-Reactor Workshop is scheduled to occur on January 17, 2008.
A Busy Process Retreat Sparked A Host of Actions

This year’s retreat was held in the Isle of Palms, South Carolina on October 18-19, 2007. The purpose of the retreat was to review current CAB activities and processes to identify any areas for improvement. The retreat was a collaborative brainstorming effort of CAB members, DOE, and Regulators and was well-attended. Below is a list of actions developed by the group.

- Conduct a working session to develop the annual Work Plan on the Monday prior to the January Board meeting and vote on it at the Tuesday full-CAB session.
- Review information from Oak Ridge and develop student participation letters.
- Pilot a Saturday committee meeting and report back in March 2008.
- Explore technology options of holding meetings and report to the Board in March.
- Revive the Speakers Bureau and report to Executive Committee at the March meeting.
- Members should attend the new member orientation both their first and second year on the Board.
- Presentation on Federal Advisory Committee Act (FACA) should be incorporated in the new member orientation and the orientation should include more CAB process and less technical Site information.
- Evaluate scheduling the Process/Educational Retreat on a weekend, including possibility of holding both retreats annually.
- Revitalize CAB’s outreach activities.

Brainstorming Ideas at Retreat

- Develop an SRS CAB Internal Process document to include those topics that are not in the new Standard Operating Procedures (SOP), but were in the old SRS By-Laws and Standing Rules, then submit to the full Board in November for review and approval.
- Resurrect the original proposal on institutional memory and work with the Administrative Committee.
- Design new logo and update CAB website to be presented at the November meeting.
- A presentation on development of the Work Plan should be made at the January Meeting.
- Renew emphasis on the Mentor Program.
- Starting in January, committee meetings should begin at 6:00 p.m.
Citizens Advisory Board

Key criteria for Board membership includes a time commitment and the willingness to study the issues and work toward clear, implementable recommendations.

To apply for membership to the Citizens Advisory Board, please call 1-800-249-8155.

*Board Beat is published semiannually by the Savannah River Site Citizens Advisory Board. Content is provided by Board members and support staff. Please send your comments and suggestions to:

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Aiken, SC 29802
Phone: 1-800-249-8155
Fax: 803-932-9228
www.srs.gov/general/outreach/srs-cab
Email: citizensadvisoryboard@srs.gov

### Upcoming 2007 & 2008 Citizens Advisory Board Meetings

<table>
<thead>
<tr>
<th>Date</th>
<th>Location</th>
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<tbody>
<tr>
<td>November 26-27, 2007</td>
<td>Augusta Marriott</td>
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<td>Augusta, GA</td>
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### 2008 Meeting Schedule

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<tr>
<th>Date</th>
<th>Location</th>
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<tr>
<td>January 28-29</td>
<td>Crowne Plaza</td>
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<tr>
<td></td>
<td>130 Shipyard Drive</td>
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<td></td>
<td>Hilton Head, SC</td>
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<td>March 24-25</td>
<td>Radisson Hotel</td>
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<td></td>
<td>2100 Bush River Road</td>
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<td>Columbia, SC</td>
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<td>May 19-20</td>
<td>DoubleTree Hotel</td>
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<td></td>
<td>411 West Bay Street</td>
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<td>Savannah, GA</td>
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<tr>
<td>July 28-29</td>
<td>Center for Hydrogen Research</td>
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<td>Gateway Drive</td>
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<td>Aiken, SC</td>
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<td>September 22-23</td>
<td>Sheraton</td>
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<td>4770 Goer Drive</td>
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<td>North Charleston, SC</td>
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<tr>
<td>November 17-18</td>
<td>DoubleTree Hotel</td>
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<td></td>
<td>2651 Perimeter Pkwy.</td>
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<td>Augusta, GA</td>
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**Note:** Individual committee meetings will be held

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CAB Members - July 2007

“Come join us at our next meeting!”