As construction begins on the Uranium Processing Facility bomb plant in Oak Ridge, Tennessee, the government is providing a brief, rare public comment period on the latest environmental review.

When OREPA and Nuclear Watch New Mexico filed a lawsuit in July 2017 challenging the government's environmental analysis of the UPF bomb plant, the government's official response was dismissive. Over and over again, they brushed off our complaints with legal language that declared our arguments had no merit.

It turns out, though, that those were not their final words. Or the semi-final words. Even as it argued to the court that its previous environmental studies were adequate, the government secretly was preparing a second Supplement Analysis—a study of the 2011 Site-Wide Environmental Impact Statement to determine whether the EIS needed to be supplemented with additional information—a tacit admission that its previous analysis had gaping holes.

On May 19, the NNSA released the Supplement Analysis and, in a virtually unprecedented move, opened a 30-day public comment period, to end on June 20. Supplement Analyses never have a public comment period—they are internal documents that are prepared and released as final documents.

Not surprisingly, this SA scanned the earlier documentation, noted some minor deficiencies, and offered language designed to assure the court that they had taken a look at all the issues. In the end they determined no further environmental analysis is necessary.

They still don't get it.

We are not persuaded. The analysis in the SA is weak and in many cases superficial. The most serious question—What are the environmental risks that come with the decision to press two out-of-compliance buildings into service for another 20-30 years?—is left unanswered.

In fact, NNSA says it doesn't have the information needed to actually answer that question: instead, it will assemble a team of experts to evaluate the buildings, create some new computer models, and prepare a new analysis. No timeline for completing this evaluation is given.

Even as it admits that it is not using the most current earthquake hazard data and has not updated its construction standards, the government offers this assurance: "NNSA believes that it can continue to operate the enduring facilities in a safe manner for the foreseeable future."

That's it. The safety of workers and the public, the structural integrity of the aging facilities, comes down to an article of faith. Trust us, says the agency responsible for the half billion dollar space/fit fiasco. Trust us, says the agency that created its current UPF plan over three years of total secrecy, determinedly locking the public out of the process at every step. Trust us, says the agency that continues to insist it will bring its project in on time and on schedule, but refuses to show the budget or schedule to the public.

...continued
The work NNSA admits it has not yet done—figuring out the soundness of the old buildings it intends to use for 20-30 more years—is exactly the work that needs to be in the new Environmental Impact Statement we are asking for. In the meantime, workers are poised to begin construction of the UPF bomb plant according to a design that depends on certain operations being located in the out-of-compliance buildings 9215 and 9204-2E.

**BUILDING YET?**

It is not clear whether or not construction on the UPF bomb plant itself has actually begun. In March, NNSA announced it had completed its baseline cost and schedule and had received Critical Decision-2/3 approval—Performance Baseline and Site Construction—for the project, authorizing the beginning of construction.

We know that significant “site preparation” work has been going on for some time—this is work that would look to you like construction, but in the arcane world of NNSA technicalities, it is not categorized as construction.

The April 2 weekly report from the Defense Nuclear Facilities Safety Board indicates the Critical Decision approvals are conditioned on the contractor attaining an Earned Value Management System certification by June 2018 and completing all corrective actions identified in a final External Independent Review of the UPF plan.

In the Supplement Analysis, NNSA says work on one nuclear building has begun and is expected to begin in late May on the main UPF building.

The one thing we know for sure is that the money is flowing. Congress approved $663 million in this year’s budget and the Senate has approved $700 million for next year. The total expected cost is unknown—NNSA refuses to release the Baseline Cost Estimate to the public.

**MAYBE IF WE ALL SAY IT…**

The new SA is open for public comment. Maybe if we all say it, directly, clearly and on the record, they will get it.

You do not have to be an expert to comment on the SA; it is important that we demonstrate to NNSA that people are paying attention and holding them accountable. This is something they are not used to.

Submitting comments is also a way to support our legal challenge. We will be able to tell the court that many people object to the piecemeal, half-hearted papering over of legitimate environmental, safety and health concerns.

You will find talking points on the next page. Look them over, choose one or two, and write your message. It does not have to be long or fancy. Direct and from the heart are great. You are also not limited to the talking points here.

Your comments to the NNSA on the 2018 Supplement Analysis for the Site-Wide Environmental Impact Statement for the Y-12 National Security Complex (DOE/EIS-0387-SA-02) must be submitted by June 20, 2018. Comments sent after that date may be considered by NNSA, but it isn’t required to consider them.

Here’s where to send your comments (choose one method):

- Jack Zanger, Attn: Y-12 SWEIS SA
  P O Box 30030, Amarillo, TX 79120
- Fax: Mr. Zanger at 806 573 7108
- Email to: jack.zanger@npo.doe.gov.
- Always reference Y-12 SWEIS SA.

If you want to read or download the SA, you can find it here: https://www.energy.gov/sites/prod/files/2018/05/f51/EIS-0387-SA02-2018.pdf; or you can go to the articles on OREPA’s web site and click on the link at the end.

What the ? What’s going on…and why it matters

Whenever a federal agency’s plans change significantly, or when new information comes to light, the government is required to revisit its existing environmental documentation to see if it still adequately covers the new circumstances.

In 2014, plans for Enriched Uranium operations at Y12, described in the 2011 Site-Wide EIS, underwent a dramatic change—the UPF bomb plant would no longer house all EU operations in a new, clean, high-tech facility. Instead, a scaled back version of the UPF, dedicated solely to building bomb parts would be constructed, and two aging buildings, which NNSA admits do not meet current environmental or seismic codes, would be used for 20-30 more years for dangerous weapons and other enriched uranium operations.

In addition, new earthquake hazard maps raised the risk level in Oak Ridge significantly.

These changes required NNSA to prepare a “Supplement Analysis”—a look at the old EIS to see if they needed to prepare a Supplement to the EIS or a new EIS.

In 2016 they released their SA and a Record of Decision that said the old EIS was sufficient. We sued. They have now prepared a second SA, and have decided, once again, the old EIS is sufficient.

The purpose of the National Environmental Policy Act is twofold: it wants to be sure all environmental issues have been covered before a decision is made by a federal agency on how to proceed, and it requires the government to involve the public at every step of the process.

After shutting the public out for more than 5 years while it made huge decisions, NNSA is now offering a 30 day comment period (no public hearing) on a document that does not answer significant questions about the old, out-of-compliance buildings.

These questions must be answered in a Supplemental EIS on the EU program at Y-12. And since the outcome of that S-EIS will impact the UPF, construction should be stopped until the S-EIS is completed.

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KEY TALKING POINTS

**Here are key talking points.** You can pick and choose issues that resonate with you, or you can create your own comments. We encourage you to put your concerns in your own words.

- **Worker and Public Safety First.** Any plan that relies on using the 9215 Complex and Building 9204-2E for decades to come must make worker and public safety the highest priority—not cost or schedule or “mission need.” If the buildings cannot be brought into compliance, they cannot be used. If the work cannot be done safely (not “as safely as possible,” but safe—period), it can’t be done.

- **Safety First Means** answer the safety questions before you start moving material from Building 9212 into the 9215 Complex. Safety first means answering fundamental questions about where work will be done before you commit irrevocable resources to a UPF design that relies on much of the enriched uranium work being done in out-of-compliance buildings.

- **If it turns out** that Complex 9215 and Building 9204-2E can not be brought into compliance and are deemed unsafe by the experts and computer models yet to be designed, and the UPF is already 1/3 built, there is no going back to redesign the UPF to accommodate the rest of EU operations.

- **The NEPA Process** is a good one. It lays out a chronology for decision-making that requires horses to stay in front of carts, so that one decision follows from another in a rational sequence. To plunge forward with construction of the UPF before final decisions are made on EU operations is a direct contradiction of the requirements of NEPA. Decisions can not be segmented, neither can they leapfrog over NEPA requirements for the sake of convenience.

- **The existence of a second SA**, less than two years after the first SA, is clear evidence that the 2011 Y-12 Site-Wide EIS had gaps that require preparation of a full Supplemental-EIS. The plans for Enriched Uranium Operations have changed dramatically, in ways that change the fundamental assumptions about the environmental impacts of the EU program. And new information—the 2014 earthquake hazard map updates of the US Geological Survey and additional information about historical seismic activity in East Tennessee—must be included in the new EIS and incorporated into design decisions for all enriched uranium operations buildings, including the UPF.

- **It is never okay** for a NEPA document to gloss over important environmental concerns with “we’re going to look at that soon, but for now we’re moving ahead with plans that can not be undone.” The point of NEPA is to force the analysis to be done before decisions are made.

- **The current SA** relies on vague generalities at points that require solid answers, “It may be possible to upgrade both facilities…(p.19); “a reduction in the Material at Risk limit has the potential to reduce the accident consequences… (p.20).” “NNSA believes that it can continue to operate…in a safe manner…(p.20)” “It appears that those risks and consequences are lower…(p. 18)”

- **The SA also includes** statements that are simply untrue. In discussing the challenges of cleaning up high-risk facilities in Oak Ridge, the SA says “EM [Environmental Management] schedules…are based upon priorities driven by potential for off-site environmental risks.” This flies in the face of the finding of the Department of Energy’s Inspector General who placed Building 9201-5 (Alpha-5) at Y-12 at the very top of the Excess High-Risk Facilities top ten list. It is the worst facility in the country. It poses, in the words of the DOE Inspector General “an ever-increasing risk to workers and the public.” This is not speculative, it is not projecting into the future—it says there is a risk now, to workers and the public, and it is getting worse. But there is no funding to begin cleanup on Alpha-5 in DOE’s more-than-$5 billion cleanup budget. Other, lower-risk, shovel-ready cleanup activities are being prioritized because they are easier and because DOE’s Environmental Management leadership wants to show some wins. While risk is a consideration in setting cleanup priorities, it is not the determining factor.

- **Far from documenting** that sufficient environmental analysis has been done for Complex 9215 and Building 9204-2E, the 2018 Supplement Analysis does just the opposite—it states that safety and performance models have not yet been developed that allow us to understand fully the environmental impacts of a significant event. This confirms the OREPA/NWNN/NRDC lawsuit’s claim that a new EIS must be prepared for the entire EU program before the UPF can be built.

- **Concerns about** the seismic performance of the aging facilities at Y-12 have been repeatedly confirmed by the Defense Nuclear Facilities Safety Board; among other things they found NNSA can not be certain that a design-basis accident in Complex 9215 and Building 9204-2E would not trigger a nuclear criticality event. NNSA’s response: “We will figure this out in the future;” is not acceptable; it kicks critical decisions (no pun intended) down the road, placing workers, the public, and NNSA’s own mission capability at risk.

Your comments to the NNSA on the 2018 Supplement Analysis for the Site-Wide Environmental Impact Statement for the Y-12 National Security Complex (DOE/EIS-0387-SA-02) should be submitted by June 20, 2018. See page 2 for info on how to send them.
Four days in the nation’s capital is an education when it comes to seeing the sausage of nuclear weapons policy made. The first thing one has to do is suspend rational thought—the foundation principle is mutually assured destruction. From there on, it is just farther and farther down the rabbit hole into discussions of “usable” nuclear weapons, spending billions to produce a new design “Interoperable Warhead” to be shared by the Air Force and the Navy—except the Navy is adamantly opposed to the idea.

That was the world we walked through in early May—five intrepid Tennesseans joined by sixty colleagues from across the country for the Alliance for Nuclear Accountability’s thirtieth anniversary DC Days. We had meetings with staff for Senators and Representatives, and occasionally the Rep or Senator themselves. We also met with Department of Energy, National Nuclear Security Administration, Government Accountability Office, Defense Nuclear Facilities Safety Board, Office of Management and Budget and other offices. To the initiated, that’s alphabet soup—DOE, NNSA, GAO, DNFSB, OMB...

OREPA’s goal going in was to educate people and extract information about the Uranium Processing Facility bomb plant. For four years, NNSA has refused to provide any information about the total cost of the bomb plant beyond declaring, incredibly, that the bomb plant would be built for $6.5 billion. Then, in late March, they disclosed that the Baseline Cost Estimate had been prepared in advance of the authorization of the beginning of construction.

OREPA and Nuclear Watch New Mexico filed a Freedom of Information Act request for the document and asked the government to expedite the request. They declined to expedite our request—the public has no compelling need to know, they said—and put us in the queue to wait months or years for the information.

Meanwhile, the Senate put $700 million in next year’s budget for the UPF bomb plant. Our position in DC was simple—it’s our money, and taxpayers have a right to know what it is being spent on.

We found we were not the only ones in the dark. The Government Accountability Office, which is tasked with reviewing the NNSA’s UPF budget numbers, was told it could not see the document without signing a nondisclosure agreement. The GAO declined. “We don’t do nondisclosure agreements,” said a GAO official.

In office after office we asked for the information. In office after office we were told, “We’ll look into it.” Finally, in our last meeting on Wednesday afternoon, a staff person for Tennessee Senator Lamar Alexander offered this: “I can’t discuss anything pertaining to pending litigation,” referring to OREPA’s lawsuit demanding NNSA perform an adequate environmental analysis before moving ahead with the bomb plant construction.

Rather than remind him that Senator Alexander was not actually party to any litigation, and therefore not really in a position to invoke a cone of silence, we pointed out that the person who had asked the question was not a member of OREPA or a litigant—he was a regular citizen asking his government for information about how his tax dollars were being spent. After a moment pondering this, the staffer said he would see if he could get the numbers.

So, we will see.

In the end, OREPA’s delegation reported the same feelings as others who were there with us for DC Days—it was a positive experience. We felt we were heard, we learned a lot about future nuclear weapons plans, and we were exposed to the level of government incompetence that never fails to impress.

You can see more photos, in full color!, of DC Days on OREPA’s facebook page.
Each August, even if only for a moment, the world pauses to remember and reflect on the destruction of the cities of Hiroshima and Nagasaki, Japan by the atomic bombs of the United States.

In Oak Ridge, the pause is longer, and the commemoration deeper, for two reasons:
1) The Y-12 Plant in Oak Ridge produced the highly enriched uranium that fueled the first atomic bomb, Little Boy, that destroyed Hiroshima on August 6, 1945, and
2) The Y-12 Nuclear Weapons Complex in Oak Ridge continues to produce thermonuclear cores for US nuclear bombs and warheads—and has begun building a new bomb plant, the Uranium Processing Facility, to make nuclear weapons for decades to come.

WHO SPEAKS FOR THE PAST?

In Japan each August, the commemoration is huge. The Mayors of Hiroshima and Nagasaki release statements calling for the world to abolish nuclear weapons.

Hibakusha, the dwindling community of first-generation survivors of the bombings, speak of the experience, courageously recalling the days of horror in an effort to persuade the world to heed their call of “Never Again!”

In Oak Ridge, on Monday, August 6, we will gather at 6:00am on the grassy patch of ground across from the main entrance to the Y-12 bomb plant to read the names of victims, along with poetry and first-hand accounts of survivors, and join our voices to the chorus from Japan to say “Never Again!”

The Names and Remembrance ceremony is solemn and non-confrontational. Everyone is welcome, though parents should know that some of the descriptive language is graphic and extreme.

Throughout the morning, from 6:00 until 9:00, we read names, toll our bell, and tie peace cranes on a rope fence. At 8:16am, we interrupt the reading to mark the detonation of the bomb over Hiroshima.

WHO SPEAKS FOR THE FUTURE?

The UPF bomb plant now under construction in Oak Ridge is the tip of the spear of the National Nuclear Security Administration’s $1.7 trillion plan to modernize the US nuclear arsenal from the ground up.

This effort, begun in the Obama Administration and outlined in detail in the Trump Administration’s Nuclear Posture Review, has started a new global nuclear arms race, leading the Bulletin of Atomic Scientists to move the hands of the Doomsday Clock to 2 minutes to midnight, the closest in history.

On Saturday, August 4, we will gather in Oak Ridge to say “NO!” to the UPF bomb plant and “NO!” to the Nuclear Posture Review’s plans for new “usable” nuclear warheads, and “NO!” to a future in which our children and grandchildren live under the nuclear cloud of threatened annihilation.

Activities will begin at Bissell Park in Oak Ridge at 10:00am, where a program of music, speakers and theater will document the current threat and offer hope for the future. We will once again embrace the international symbol of nuclear disarmament, the Yellow X.

From Bissell Park, we will march to the Y-12 Nuclear Weapons Complex where, upon arrival, we will engage in a brief action to say NO to a nuclear future.

NAGASAKI, TOO

On Thursday, August 9, we will gather at the far west end of Sequoia Hills Park in Knoxville for a Peace Lantern Ceremony commemorating the destruction of Nagasaki, Japan.

This ceremony has grown into a lovely tradition over the years, with Buddhist drumming and chanting, traditional Japanese folk dancing, music and a peace litany, Japanese shadow puppets telling the story of Nagasaki, capped as night falls with the launching of a hundred peace lanterns into the Tennessee River.

The ceremony begins at 8:00pm in the field adjacent to the west end parking area, just off Cherokee Boulevard.

The Peace Lantern ceremony is preceded by a Lantern building party at the Riverside Catholic Worker community in South Knoxville. Watch OREPA’s website or Facebook page for details on the date and time of the lantern building party!

SPEAKING TRUTH WITH POWER

The only power we have to save the world from nuclear annihilation is people power. Our message is grounded in truth, but in order for it to be heard, it has to be amplified by people.

We need EVERYONE to come to Oak Ridge in August. Yes, it’s hot; yes, it’s just about time for schools to resume in Tennessee; yes, it’s a great time to vacation elsewhere. But if everyone chooses to “let someone else go this year,” we will present the picture of a weak peace movement, and the weaponeers will be encouraged.

Don’t come just because we asked. Come because you know it’s up to all of us and each of us to take responsibility for the future and to put ourselves and our voices on the line.
What does Y-12 do?

The Y-12 Nuclear Weapons Complex in Oak Ridge, Tennessee, plays a crucial role in making US weapons of mass destruction.

The Y-12 Nuclear Weapons Complex in Oak Ridge, Tennessee manufactures thermonuclear weapons of mass destruction. More specifically, Y-12 makes the thermonuclear core for every nuclear warhead and bomb in the US nuclear stockpile. Every one. Ever. There is no other place in the US that can make this key component for warheads and bombs.

They call it the secondary. That describes its place in the fission/fusion chain reaction that takes place in a nanosecond when a modern thermonuclear weapon is detonated.

The primary is first—a plutonium sphere (also called a pit) with a vial of tritium inserted is compressed by high explosives, resulting in a small atomic bomb—a fission reaction, if you remember your high school physics.

But the primary’s job in a modern warhead is to act as the trigger of a much larger—by many orders of magnitude—bomb, the Hydrogen bomb. This is contained in the “secondary,” made at Y-12 of highly enriched uranium, lithium deuteride, depleted uranium, beryllium, some classified materials like “fogbank,” and more. Inside the secondary, these materials undergo nuclear fusion. The result is a release of energy that has the power to level an entire city in a second.

With 1,400-plus actively deployed nuclear bombs and warheads on hair-trigger alert in silos, on airbases, in attack submarines trolling the high seas, the United States has the capacity to render life on planet earth uninhabitable in one afternoon. Russia has a similar capacity; France, China, Great Britain and the other nuclear powers can contribute, too, to a lesser degree.

The work at Y-12 requires great care, and a cadre of skilled workers to operate the precision machining equipment—there is no margin for error in a nuclear warhead’s design. The materials used at Y-12 are deadly and hazardous.

Highly Enriched Uranium has a half-life of 708 million years, meaning it is hazardous to humans for 7 billion years while it goes through its decay chain—eventually becoming lead, another toxic element.

HEU is used and stored and processed in various forms at Y-12. In solid form, it poses a moderate hazard—but if ground to dust and released into the air, it is highly carcinogenic. If enough of it is clumped together it can go critical—not like a bomb, but like an enormous pulse of energy that would kill anyone nearby immediately and subject others to radiation poisoning.

How much does it take for a criticality? That depends—if the material is submerged in water, it takes much less because water will reflect neutrons back into the mass, accelerating the process.

HEU is also pyrophoric—meaning it burns in the presence of oxygen, so fire is a great concern at Y-12, and fire-suppression equipment is a first-line defense against catastrophe.

Criticality safety is of paramount importance at Y-12, though errors and miscommunications lead to criticality safety violations on a fairly regular basis. Y-12 does not report these incidents or violations—we learn about them only later from reports compiled by agencies that exercise oversight over Y-12.

Most of the Enriched Uranium operations at Y-12 take place in buildings that were built during the Manhattan Project or soon thereafter. They are, according to site officials, being used in “run to failure mode.”

It is the need to get out of these old buildings that has created pressure to build the Uranium Processing Facility bomb plant—the UPF was originally supposed to house all Enriched Uranium operations, but budget and schedule concerns scaled it back—now the sole mission of the UPF is to build bomb secondaries and cases.

Y-12 has other missions—preparing HEU to be turned into fuel for the Nuclear Navy, dismantling retired warheads, storing HEU safely, doing work for other federal agencies, including NASA.

But the primary and overriding mission is nuclear weapons production. It is first and foremost a bomb plant, and that is reflected in the budget which prioritizes weapons activities over everything else.

These days, Y-12’s weapons work comes under the Life Extension Program. It is manufacturing replacement secondaries for the W76-1 warhead, and preparing to begin doing the same thing for the B61-12 bomb in a few years.

It is worth noting that Y-12 is also highly contaminated; it was placed on the EPA’s Superfund list in 1989 and has yet to be cleaned up. That is because production of nuclear weapons continues to take priority over protection of workers, the public, and the environment.