Message from Glenn

February 27, 2014

NRO Colleagues,

I want to share the insights from my travels in Japan last week along with other senior NRC executives associated with reactor programs, including the Deputy Executive Director for Reactors and Preparedness, the ODs for NRR and NSIR, all four Regional Administrators, the Deputy OD of Research, the Director of the Japan Lessons-Learned Directorate, and our own Scott Flanders, currently leading the NRC team assessing seismic and flooding hazards at U.S. reactors. This was the first time that the entire contingent of agency senior managers responsible for reactor programs traveled together to a foreign country. The primary focus of this trip was to witness first-hand the impacts of the March 11, 2011 Great East Japan Earthquake upon the Fukushima Dai-ichi and Daini reactors, interact directly with the superintendents, operators and responders at the affected reactor sites, and observe ongoing recovery and regulatory activities. Let me open with my bottom line: Without question, this experience ranks as the most impactful I have had in my 32 years in the nuclear field.

Of special interest to NRO and vendor oversight, we began the week by receiving comprehensive presentations and tours of the Yokohama Toshiba and IHI manufacturing facilities. We provided key messages to senior executives of those companies regarding our ongoing AP1000 module fabrication and component inspections, including our interactions and issues regarding CB&I. We had the chance to discuss the corrective actions IHI had undertaken in response to a previous NRO/DCIP vendor inspection at the facility. During the tours, we witnessed Toshiba Isogo laser-CAD development and application to the Fukushima Dai-ichi spent fuel pools' recovery, the Toshiba Liquid Sodium Test Facility, IHI safety-related work including AP1000 containment vessels and steam generators, and Toshiba Keihin work on AP1000 reactor core barrels and steam-turbine electrical generators. IHI will soon be fabricating AP1000 modules for Vogtle and Summer under contract with CB&I.

On Tuesday, we visited the world's largest reactor site, the 7-unit Kashiwazaki Kariwa Nuclear Power Plant in Western Japan, which, as you may remember, experienced the powerful Niigataken Chuetsu-Oki Earthquake in 2007. There, we observed TEPCO's comprehensive efforts in the implementation of numerous permanent and portable defense-in-depth measures, including the construction of massive sea walls and embankments to protect against a tsunami; the installation of redundant containment filtering systems (one underground); the acquisition of a massive fleet of fire trucks, emergency power vehicles and heavy equipment; and the construction of a huge reservoir high above the plants that can provide water via gravity.

On Wednesday, we met with Japanese regulatory and industry executives, including key officials at JNRA HQ (the recently-formed Japan Nuclear Regulation Authority and NRC counterpart) and senior officials of JANSI (a recently formed INPO-like organization) and discussed their ongoing initiatives and issues. That afternoon we received a highly informative, candid, and emotional presentation from the TEPCO officials who directly led and implemented the heroic efforts at Fukushima Dai-ichi amidst their attempts to prevent core damage and mitigate the consequences of the ensuing multiple unit accidents stemming from the 50-foot tsunami.

On Thursday, we visited the Fukushima Daini NPP (a site with four nuclear reactors about 7 km south of Fukushima Dai-ichi), which avoided core damage from the Tsunami's flooding waters, primarily as a result of the heroic efforts of the operators and management. During the bus ride to Fukushima Daini, we passed through the town of Tomioka, about 10 km south of Fukushima Dai-ichi. This formerly vibrant seaside village is uninhabitable as a result of radiological contamination (about 1 microsievert an hour) from the core meltdowns at Fukushima Dai-ichi. The damage caused by the earthquake and tsunami is clearly visible. Those who had lived in the town are currently allowed to enter to visit their homes, but they can't stay overnight due to radiation dose restrictions. I found it highly disturbing to watch the ongoing efforts to decontaminate the town, which authorities hope will be inhabitable in a few years. I saw a Japanese blue road sign for a crosswalk, illustrating a dad, his daughter and a bicycle, amidst this village of empty parks, schools, stores and homes. This juxtaposition struck a deep personal chord in me. I took a picture of the sign and have the photo hanging in my office to serve as a reminder of our vital mission in protecting people and the environment.

Our activities culminated on Friday at Fukushima Dai-ichi, the site which experienced massive destruction from the tsunami, lost core cooling resulting in the sequential core damage to three of the six reactors over three days, the ultimate the loss of containment and uncontrolled release of radioactivity. We donned full anti-contamination clothing and respirators, and observed the 4,000 site workers diligently addressing their daunting challenges in their own full anti-Cs, respirators, and helmets. Twisted buildings, tanks and metal, crushed concrete and smashed vehicles littered the site. We watched as they constructed and commenced filling a new enormous water tank every two days amidst their ever-growing tank farm to capture radioactive liquid. We observed the spent fuel pool recovery and the movement of the spent fuel from the Unit 4 spent fuel pool into a common site pool. We ventured inside the Unit 5 containment to experience where operators had tried to open valves to vent the suppression pool and cool the core. I will never forget these images, nor the courage and conviction of the operators in entering this confined, high-radiation area to manually operate components in the pitch black, stifling heat, and increasing radiation levels.

At the end of each day, we devoted time to reflect on what we had seen and heard. These discussions were particularly valuable. The members of our delegation had many different perspectives of what resonated most with them about what we saw and heard, but we all aligned on certain themes. Specifically, that we have to assure that the nuclear industry and the NRC are prepared for the unexpected. We also returned home with the clear sense that we must ensure that our licensees fully implement, maintain, and realistically exercise the measures that will be put in place to implement the post-Fukushima actions directed by the NRC, and that both we and the industry need to maintain an appropriate depth and breadth in technical expertise within our respective organizations. Additionally, the insights I gained emphasized for me the importance of time in a crisis and the importance of achieving a proper balance between hardened, permanent safety components and portable equipment, when adding defense-in-depth to nuclear power plants.

I feel very fortunate to work for an agency that provided me this unique experience as a regulator. The energy source we oversee commands respect, as the consequences to communities, the loss of public trust, and costs for cleanup are enormous - as enormous as our duty to the public. The images and key messages from the managers and operators of the damaged reactors will remain with me forever. The images of the heroism, anguish and

resilience of the people of Japan are indelible. In the coming weeks, you will see more about this precedent-setting trip in videos and other agency communications that are being developed. I would like to conduct a lunchtime seminar after I have a chance to review the thousands of pictures that were taken and prepare a presentation for those who are interested in a more detailed description of what our team learned and observed. I have been chatting with several of you since my return and even shared my photo with a future applicant, as they raised the topic of emergency preparedness.

Please feel free to stop by when you have time, and, as always, thanks for all you do!

West, Steven

From: West, Steven
Sent: Friday, February 28, 2014 2:08 PM
To: RES Distribution; Collins, Daniel; Trent, Glenn
Cc: Satorius, Mark (Mark.Satorius@nrc.gov); Weber, Michael; Johnson, Michael
Subject: Thoughts about Japan with photographs

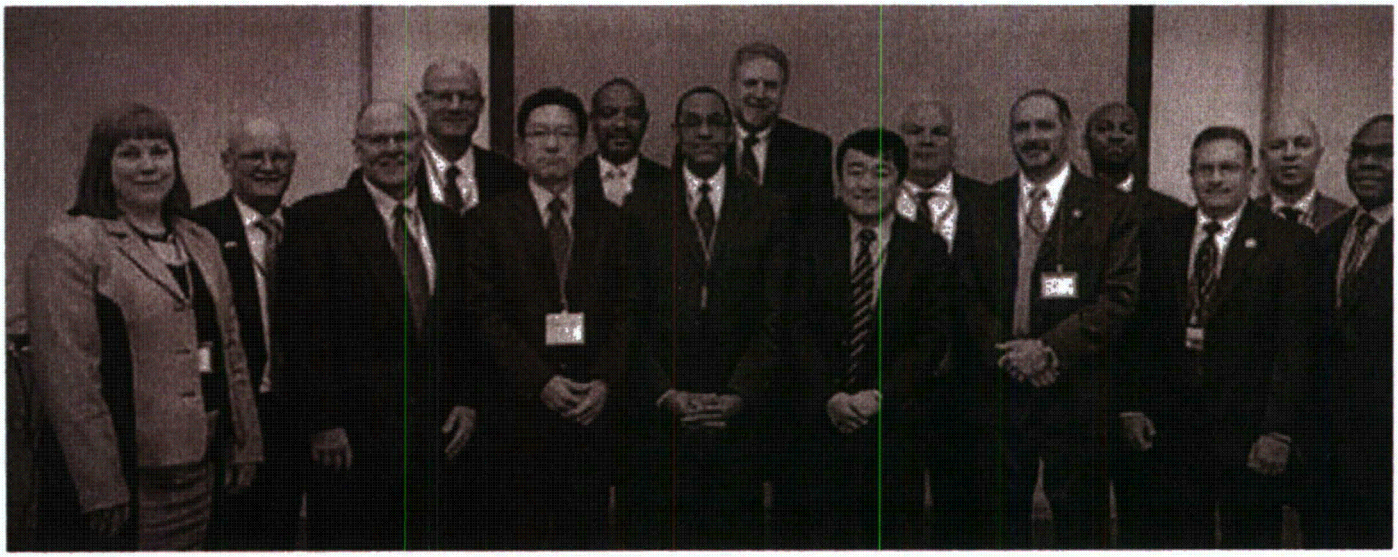
"Before Fukushima, we assumed that if our plants met all of the requirements, they were safe. We learned that this was a big mistake."
-A senior representative of the Japanese Nuclear Safety Institute

"Fukushima was very complicated, with so many back stories."
-A senior representative of TEPCO

"We thought our training had prepared us for anything that could happen."
-One of the Fukushima 50

"We should not expect our operators to be heroic."
-A senior manager at Fukushima Dai-ichi

These are but a few of the frank and powerful statements I heard in Japan last week from a virtual who's who of Fukushima. I was fortunate to have had the opportunity to represent the Office of Nuclear Regulatory Research on a trip to Japan with a team of NRC senior executives led by Mike Johnson. The team also included the directors of NRR, NSIR, and NRO; the four regional administrators; the director of the Japan Lessons-Learned Directorate; and the director of NRO's Division of Site Safety and Environmental Analysis. Notably, this was the first time all of the senior executives responsible for our reactor programs had visited a foreign country together. I likened our trip to a safety mission of sorts. In plain language, we learned a lot and we shared a lot about safety.



Mike Johnson and his senior management team with Cindy Rosales-Cooper (OEDO), Kirk Foggy (OIP), Christopher Hulick (State); and Takeyuki Inagaki (Fukushima 50) and Takafumi Anegawa, both of

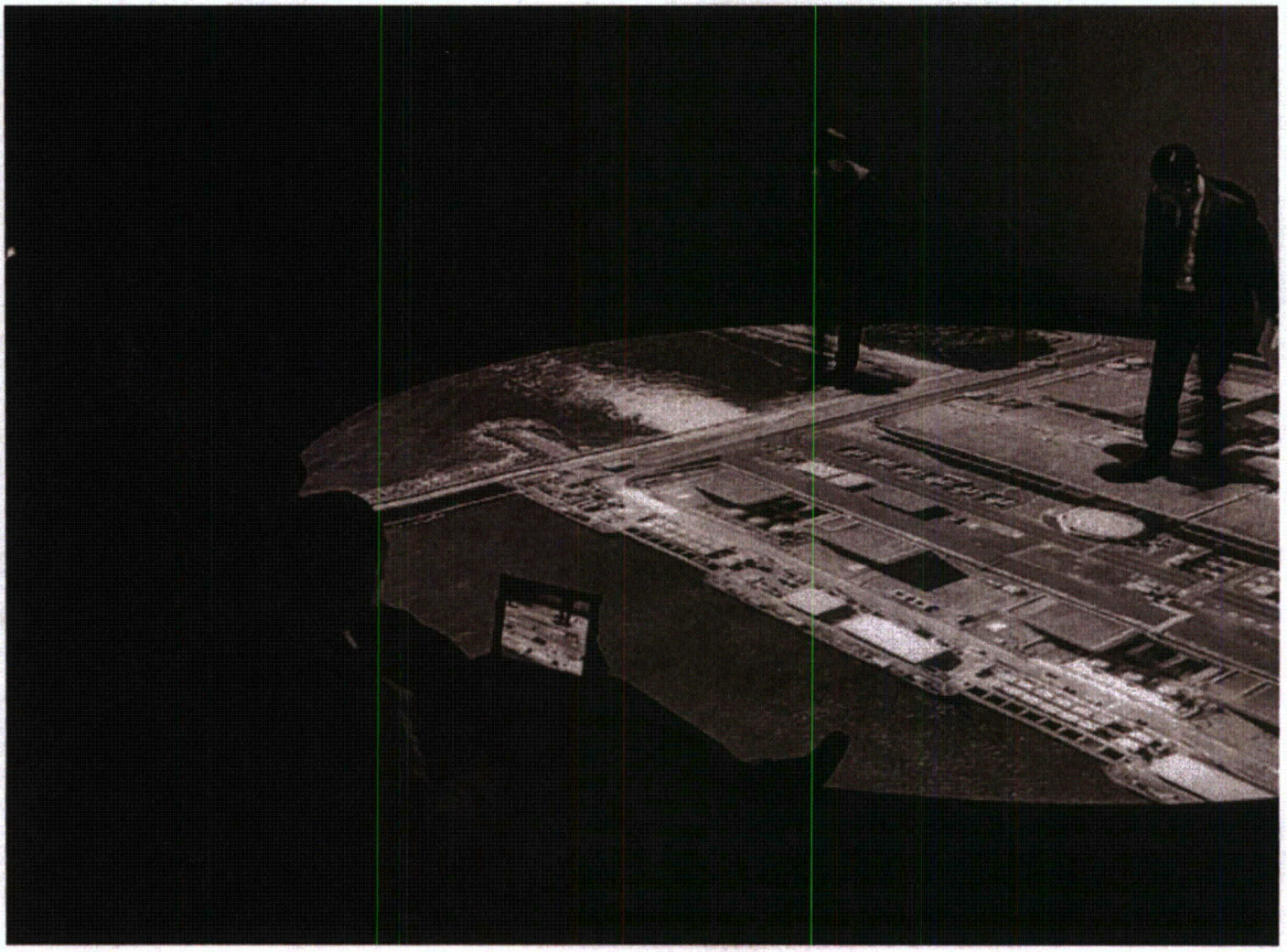
B/4

TEPCO. Roger Hannah (RII/OPA) also supported the team and took this photograph. TEPCO headquarters, Tokyo, Japan, February 19, 2014.

My overall experience was both personally and professionally rewarding for many reasons. Among other things, I heard firsthand some of the back stories about Fukushima Dai-ni and Fukushima Dai-ichi. I gained new insights into the Japanese nuclear regulator's and the nuclear industry's lessons learned from the Great East Japan Earthquake and Tsunami of March 11, 2011, the events it initiated, and its aftermath, as well as their perspectives on reactor safety and how they have changed in response to those events. I left Japan with a sense that everyone we met from both the regulator and the industry appreciated the opportunity to share their stories and their experiences with us and to answer our questions. I also feel that they valued our perspectives and insights on such subjects as reactor safety and regulation, safety culture, and event response.

After the RIC, I'll arrange a brown bag lunch (or some other suitable forum) to talk more about what the NRC team experienced and observed and to answer your questions. In the meantime, I'd like to share the following highlights and pictures from the trip.

First, from Tokyo we traveled to Yokohama and visited several industrial facilities of Toshiba and IHI. We then traveled to western Japan and toured the seven-unit Kashiwazaki-Kariwa nuclear power station (NPS). Back in Tokyo, we met separately with the Japan Nuclear Regulation Authority, Tokyo Electric Power Company (TEPCO), and the INPO-like Japanese Nuclear Safety Institute. Then, we visited areas of Fukushima Prefecture that had been shattered by the earthquake, the tsunami, and the radioactive contamination, including areas that had been rendered uninhabitable and abandoned. Finally, and the highlight of the trip for me, we visited and toured the four-unit Fukushima Dai-ni NPS and the six-unit Fukushima Dai-ichi NPS.



Team briefing prior to visiting the Fukushima Dai-ni NPS. TEPCO visitors' center, Tomioka, Fukushima Prefecture, February 19, 2014.

As you might expect from such a diverse group of NRC managers, we had many different views about what we had seen and heard. Nevertheless, we easily aligned on several central themes. They included the importance of ensuring (1) that our licensees implement, maintain, and exercise all of the NRC-directed post-Fukushima actions; (2) that both the NRC and the nuclear industry are prepared for the unexpected; and (3) that both the NRC and the nuclear industry maintain appropriate technical expertise. I'll provide context about these overarching themes when we meet.

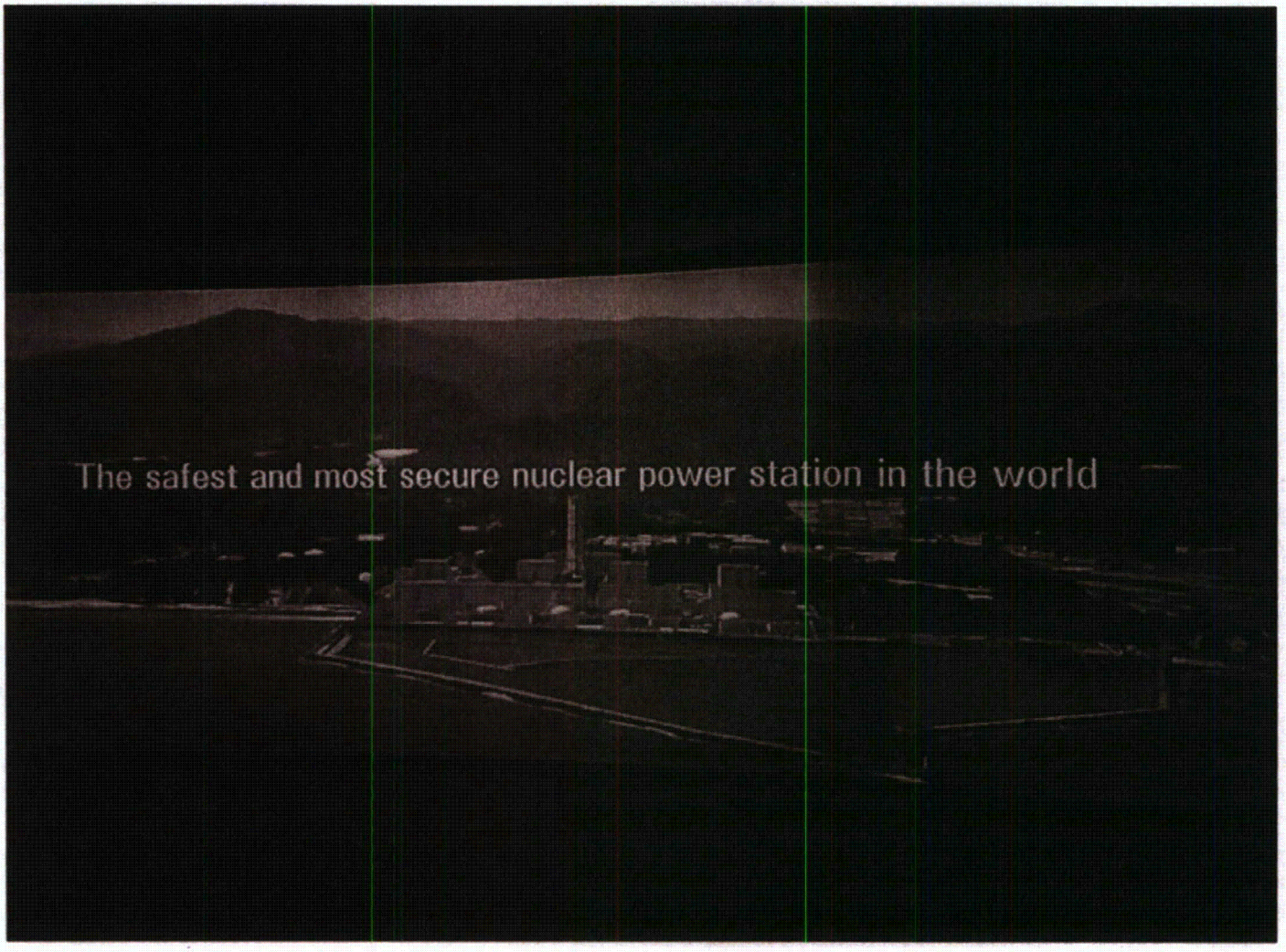
Especially sobering was driving through the towns and areas of Fukushima Prefecture that were rendered uninhabitable 3 years ago as a result of radioactive releases from Fukushima Dai-ichi. The extent of the devastation caused by the earthquake, the tsunami, and the contamination was clearly visible. We saw evidence of landslides, uprooted trees, downed transmission towers and other structural damage. In an effort to decontaminate the countryside, workers had cleared soil and vegetation from fields and rice paddies and left it piled under large tarps in fields along the side of the road and in the distance. The police manned checkpoints and enforced access restrictions, and many workers wore protective clothing to guard against personal contamination. In these uninhabited areas, homes, businesses, churches, and schools sat empty and the playgrounds were quiet. Many will never be reoccupied or used again by the displaced population. We saw abandoned goods and products on store shelves, cars and trucks abandoned in crumbling driveways and parking lots, and over-grown and unkempt yards, gardens, and parks.

A damaged and abandoned home seen while driving up the coast in Fukushima Prefecture. February 19, 2014

Damaged restaurant and businesses in the abandoned town of Tomioka, Fukushima Prefecture. February 19, 2014.

Earthquake damage and the effects of abandonment in the town of Tomioka, Fukushima Prefecture. February 19, 2014.

Before touring Tomioka, one of the uninhabitable towns in Fukushima Prefecture, we first stopped at the TEPCO visitors' center. We became the first and only visitors to the center since TEPCO had abandoned it after the Fukushima Dai-ichi accident. That stop is a story unto itself.



TEPCO visitors' center in the abandoned and uninhabitable town of Tomioka, Fukushima Prefecture. This is the closing segment of TEPCO's pre-Fukushima video about nuclear energy, the Fukushima NPSs, and Fukushima Prefecture. February 19, 2014.

The team was taken by the personal stories of several of the individuals who experienced the earthquake and tsunami at Fukushima Dai-ni and Dai-ichi and who stayed on site and participated in the response to the ensuing events. Their tales about the unexpected and ever-changing plant conditions, extreme working conditions including total darkness and elevated radiation levels, fears of injury and death, frequent setbacks, external interference, and in many cases, not knowing for up to 2 weeks the fate of family members, were both moving and inspiring. One responder at Fukushima Dai-ichi reported afterwards that he "asked for volunteers to manually open the vent valves. Young operators raised their hands as well. I was overwhelmed." Another responder said, "Unit 3 could explode anytime soon, but it was my turn to go to the main control room. I called my dad and asked him to take good care of my wife and kids should I die." There were many other such testimonials.

I could tell you about many other stories and observations from my trip—visiting J-Village, the "tsunami water" still visible in lighting globes in the overhead of a switchgear room at Fukushima Dai-ni, and the seemingly fortuitous completion of a seismically isolated emergency response center at Fukushima Dai-ichi mere months before the tsunami and the events it caused—but I'll stop here for now. I look forward to sharing more with you soon.

The entrance to J-Village. February 19, 2014.

Until then, keep living the values and have a safe day.

Steve

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U.S.NRC
United States Nuclear Regulatory Commission
Protecting People and the Environment

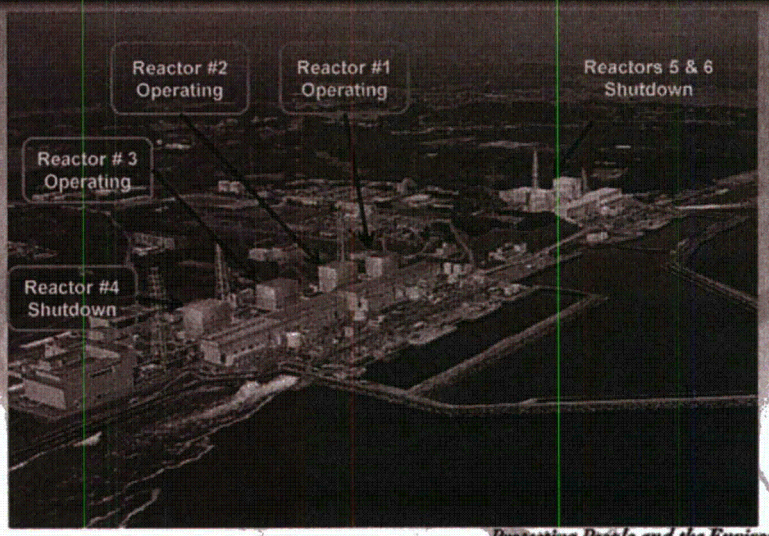
Japan and Fukushima Dai-ichi

Presentation to
NSTC Subcommittee on Disaster Reduction

Steven West
Deputy Director, Office of Nuclear Regulatory Research
U.S. Nuclear Regulatory Commission

May 1, 2014

Fukushima Dai-ichi Before the Event



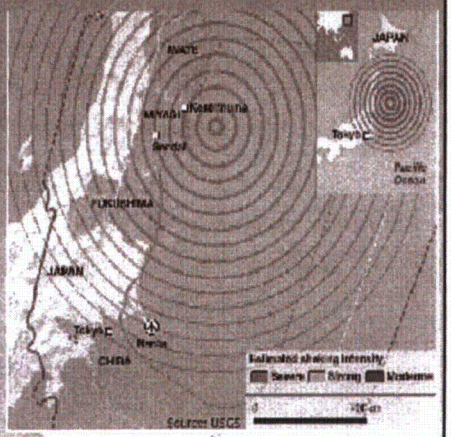
2

Protecting People and the Environment

Earthquake

March 11, 2011
9.0 Earthquake

- 5th strongest ever recorded
- Epicenter 112 miles from site
- Shaking lasted over 3 minutes
- Moved Honshu island 8 feet east
- Shifted Earth on axis 4-10 inches
- Large aftershocks



Initial Plant Response

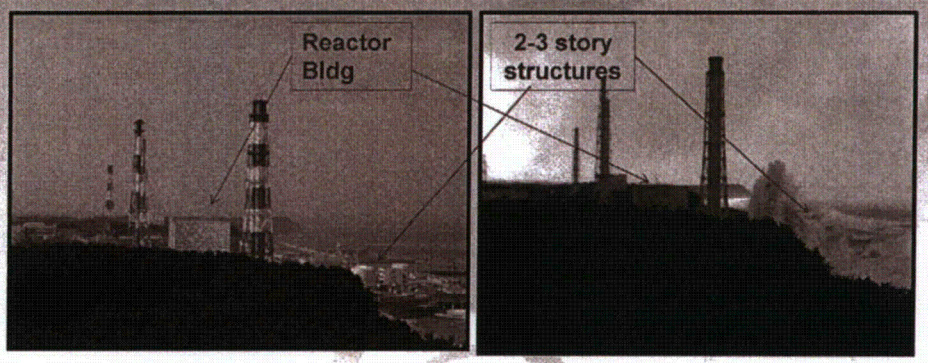
- Reactors shut down as expected
- Emergency diesel generators supplied power as expected
- Plant conditions stable and controlled

3

Protecting People and the Environment

Tsunami

- Site designed to withstand 19 foot tsunami
- Hydrodynamic forces were not considered
- Actual height estimated 46 - 49 feet



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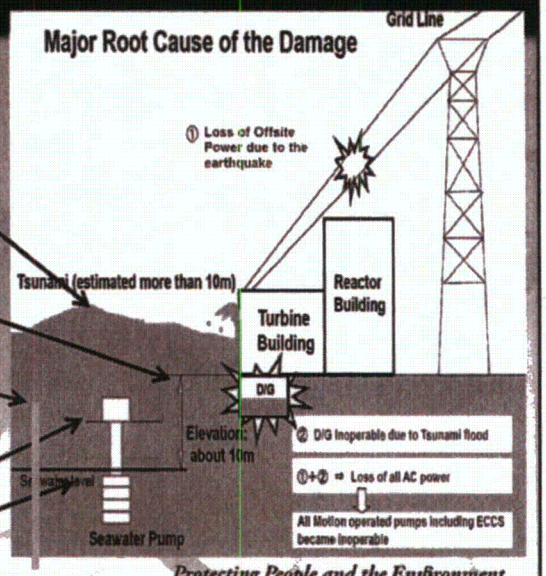
Protecting People and the Environment

Flood Damage

Reference Levels

- 46 feet. Tsunami Peak Elevation
- 42.5 feet Ground elevation of Units 5-6 TB/RB
- 33 feet Ground elevation of Units 1-4 TB/RB
- 17 feet Assumed highest tsunami and elevation of break wall
- 13 feet Ground elevation of intake structure
- 0 Feet Sea level



Protecting People and the Environment

Site and Working Conditions

- High mental and physical stress, uncertainty and setbacks
- Many aftershocks and tsunami alerts
- Loss of ac and dc power impacted equipment, lighting, indications and communications
- Open manways and unsound terrain
- Debris, rubble and obstacles
- Respirators and protective equipment
- Elevated radiation fields
- Concern about family and loved ones

6

Protecting People and the Environment

General Accident Progression

- Plant status unknown or questionable
- Heat removal capability lost
- Reactor temperature/pressure rise
- Core uncovery
- Fuel cladding T > 2200 F → hydrogen
- Hydrogen migration, accumulation and explosions
- Elevated radiation levels

Unit 1

- Most severe conditions
- Intermittent injection and venting
- Possible reactor pressure vessel (RPV) breach or stuck open safety relief valve
- Fuel melt (about 4.5 hours after earthquake) and core damage
- Hydrogen generation and explosion
- Elevated radiation levels and offsite release

Unit 2

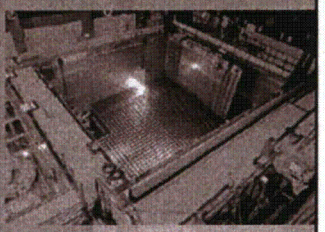
- Core injection for about 70 hours
- More time to prepare line-ups before doses increased
- Unit 1 explosion prevented core injection
- Unit 3 explosion damaged vent alignment and seawater injection staging
- Complications in depressurizing the RPV and venting containment led to core damage
- Elevated radiation levels
- Last core to melt – came close to saving

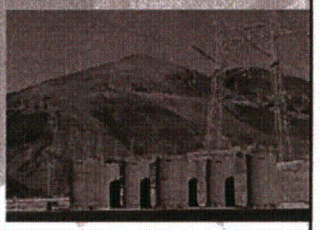
Unit 3

- Initial conditions not as severe as Unit 1
- Dc power available for about 30 hours
- Core injection available for about 35 hours
- Fire engine pump could not inject until the RPV pressure was reduced
- Safety relief valves could not be opened without ac and dc power and air
- After about 6 hours without injection → core melt (about 40 hours after the earthquake)
- Hydrogen explosion
- Elevated radiation levels

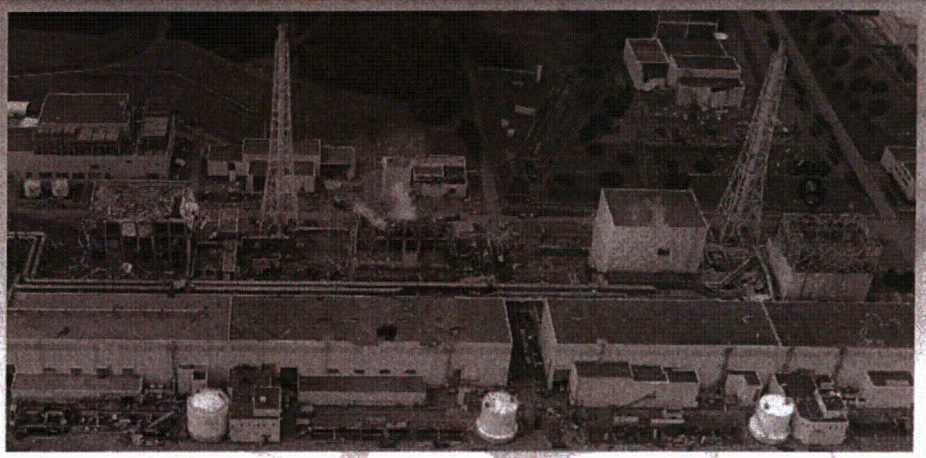
Unit 4 and Spent Fuel Safety

- Dry cask storage was flooded but fuel remained cool
- Spent fuel pools maintained structural integrity
- Unit 6 diesel generator provided heat removal to the Units 5 and 6 pools and the fuel in the cores
- Unit 4 spent fuel pool
  - Elevated temperatures was a concern
  - Hydrogen explosion due to backflow of hydrogen from Unit 3 gas treatment system
  - Concern diverted attention from the reactors

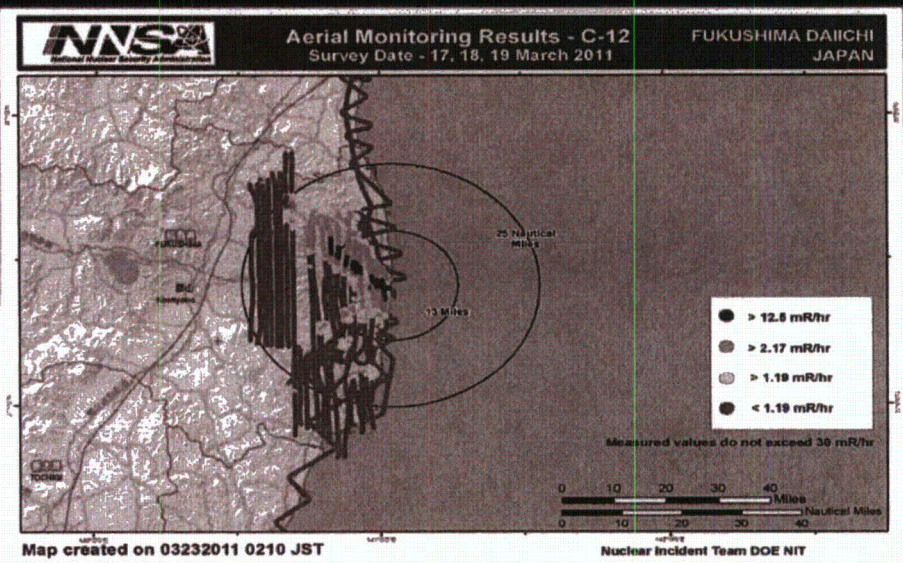




After Hydrogen Explosions



Radiological Release



Fukushima Dai-ichi Site Today

Removing Rubble from Unit 4
March 3, 2012

- All reactors are stable
- Fuel pool cooling is reliable
- Decontaminating water in 1000+ storage tanks and ground water control is a priority
- Releases do not pose a public health and safety concern
- Cleanup continues
- All six units being decommissioned (40 year project)
- 4,000 workers per day

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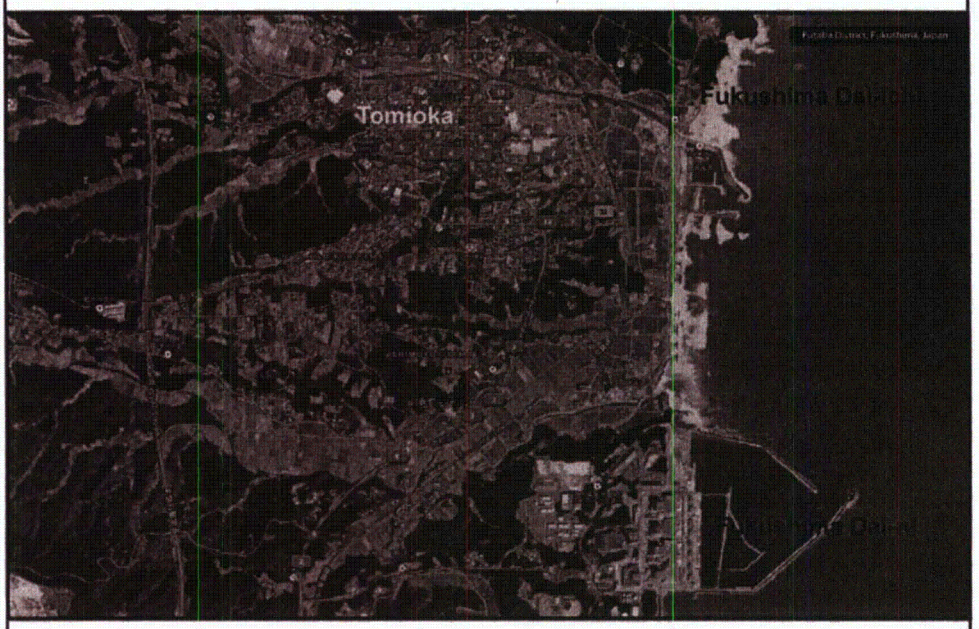
Protecting People and the Environment

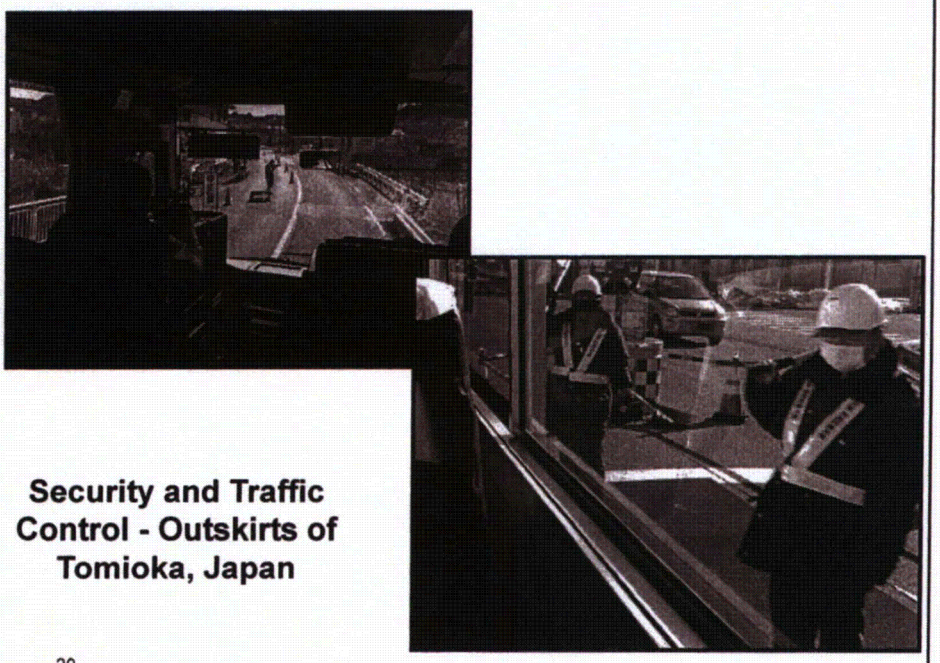
NRC Executive Team Visit to Japan



17 **Tomioka Area, Japan, February 2014**

18 **J Village, February 2014**

19 Between J Village and Fukushima Dai-ni, February 2014



Security and Traffic Control - Outskirts of Tomioka, Japan

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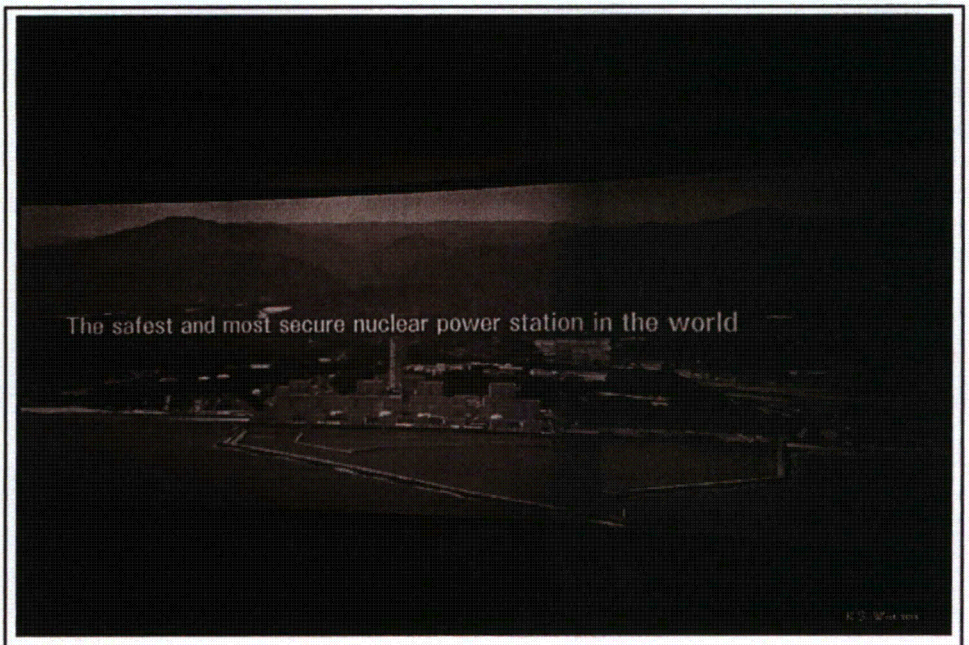
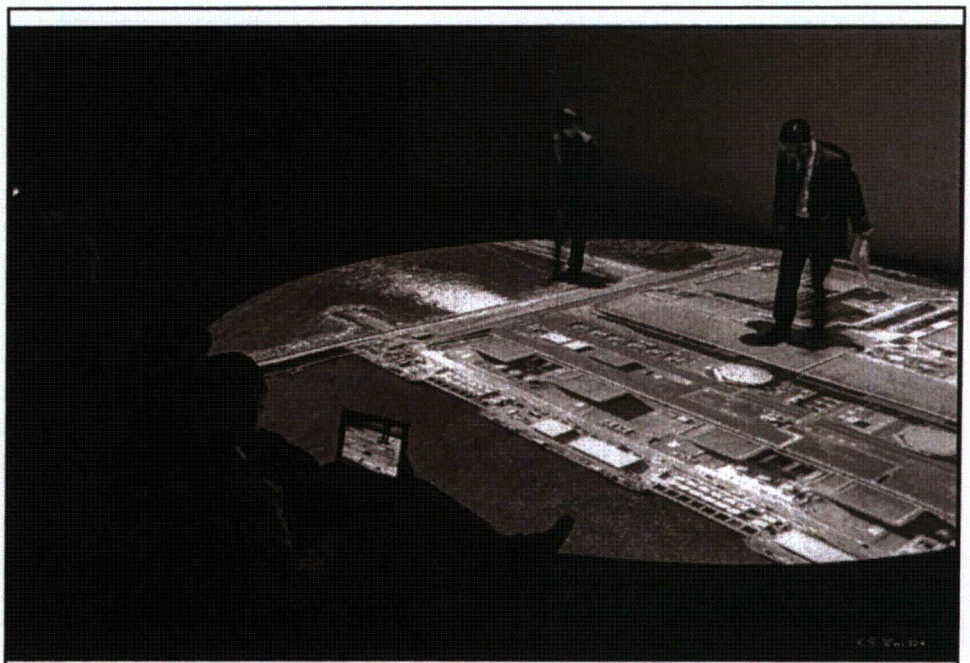
21 Tomioka, Japan, February 2014

22 Tomioka, Japan, February 2014



23 Tomioka, Japan, February 2014



24 Tomioka, Japan, February 2014

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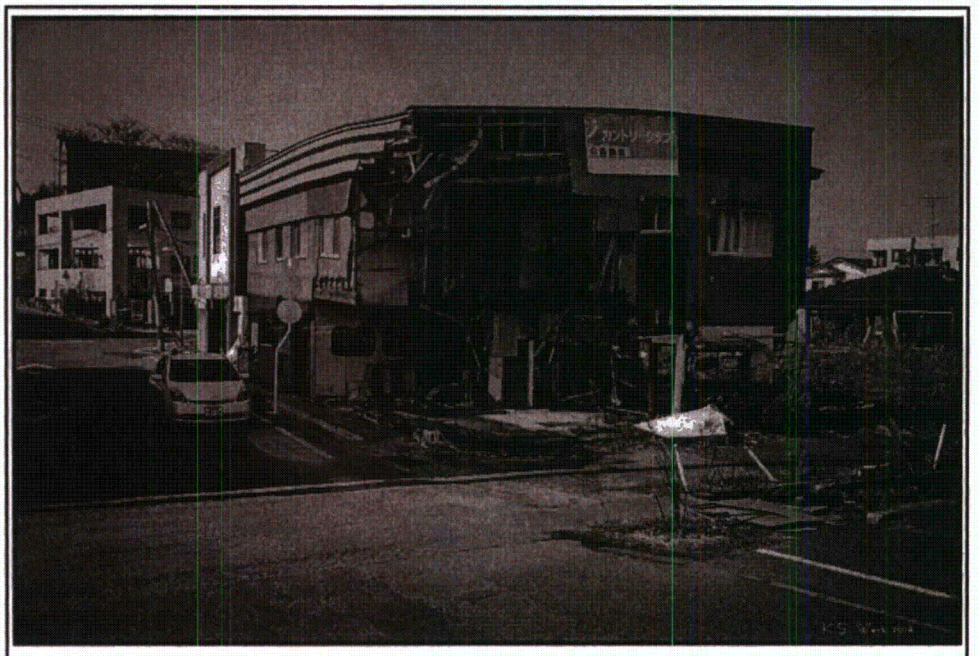
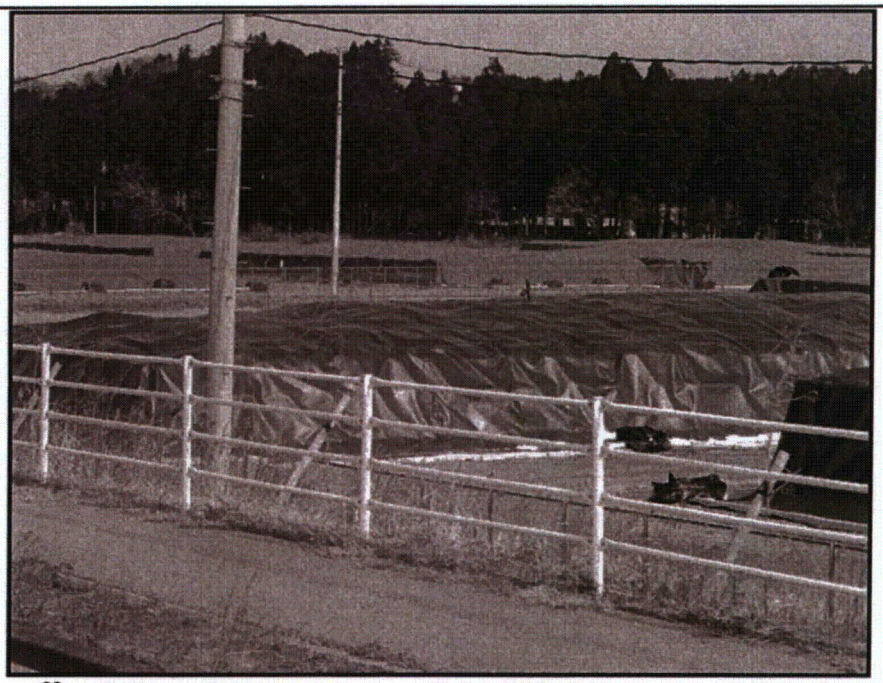
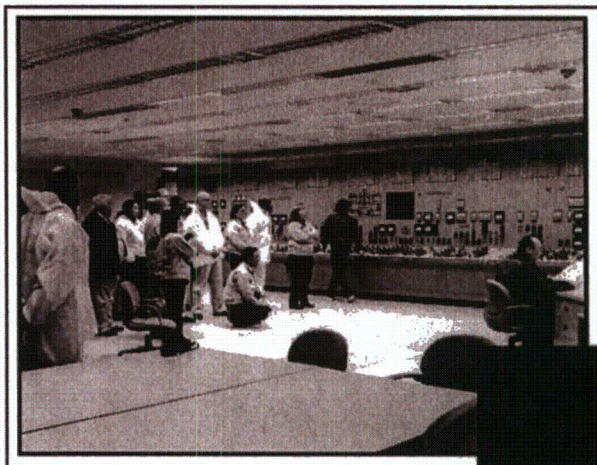


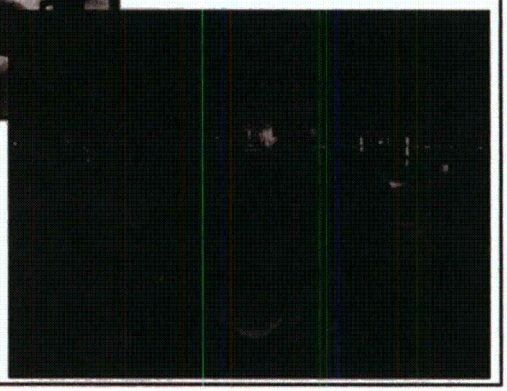
30 Tomioka, Japan, February 2014

31 Outskirts of Tomioka, Japan, February 2014



32 Cleanup and Decontamination, Outskirts of Tomioka, Japan, February 2014





Fukushima Dai-ni Control Room Simulation

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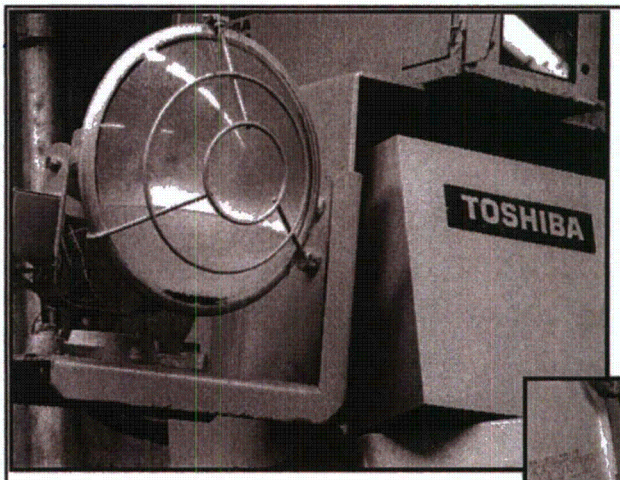
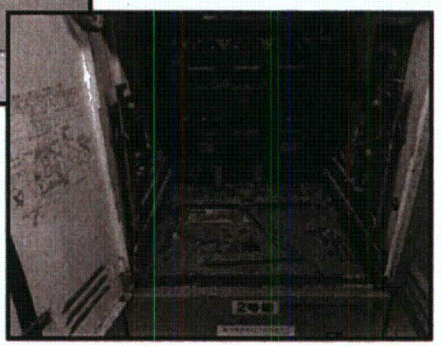
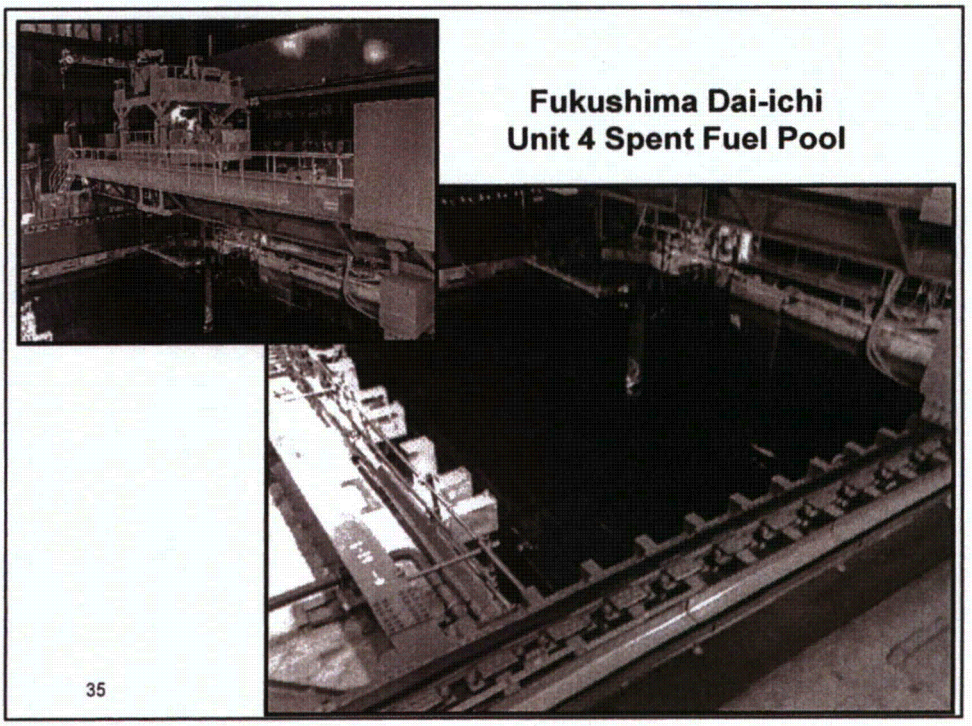
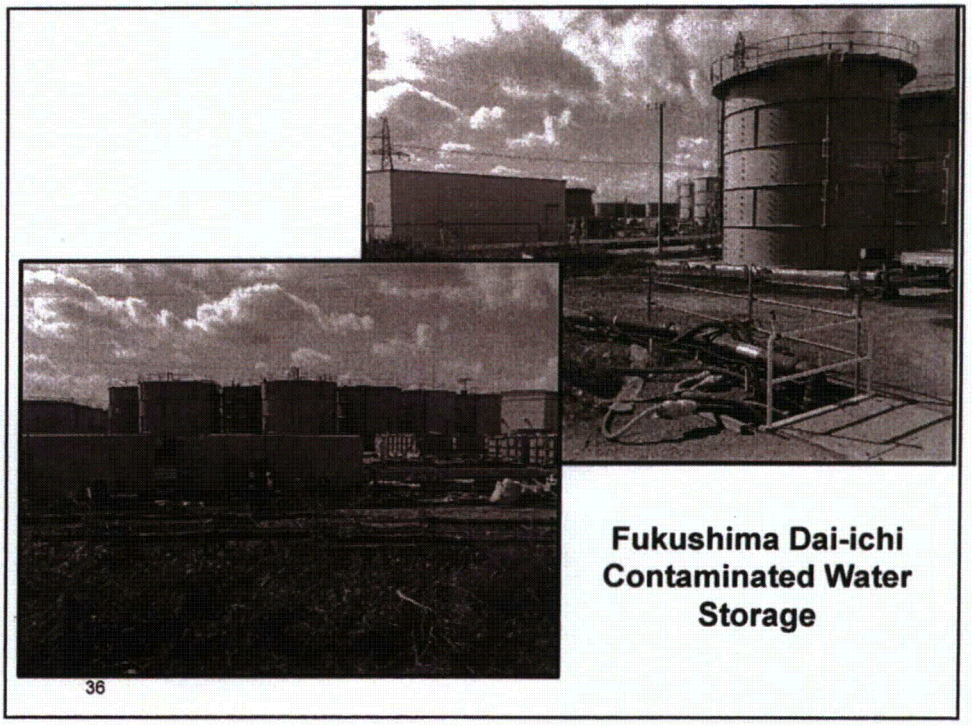


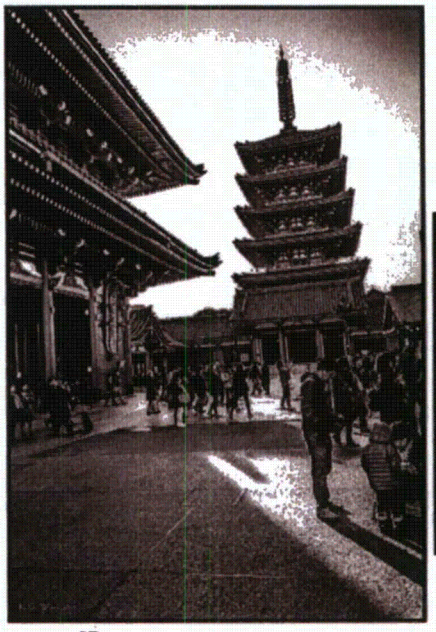


Fukushima Dai-ni "Tsunami Water" and Flood Damage

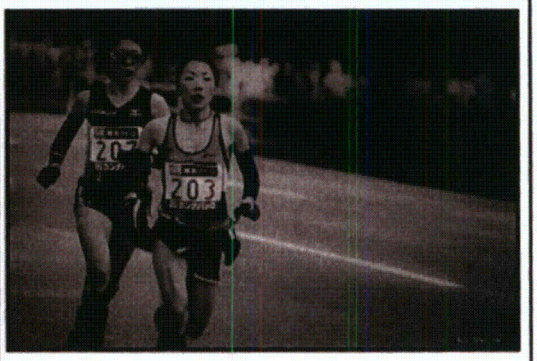
34


Fukushima Dai-ichi
Unit 4 Spent Fuel Pool
35


Fukushima Dai-ichi
Contaminated Water
Storage
36



Sensoji Temple



Tokyo Marathon 2014

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Closing

- The tragedy in Japan is unprecedented
- The Japanese are dedicated to sharing their experiences worldwide to help improve nuclear safety
- No imminent risk from continued operation in the United States
- NRC is moving forward with identified enhancements for U.S. plants
- The changes will help prepare our licensees for the unexpected

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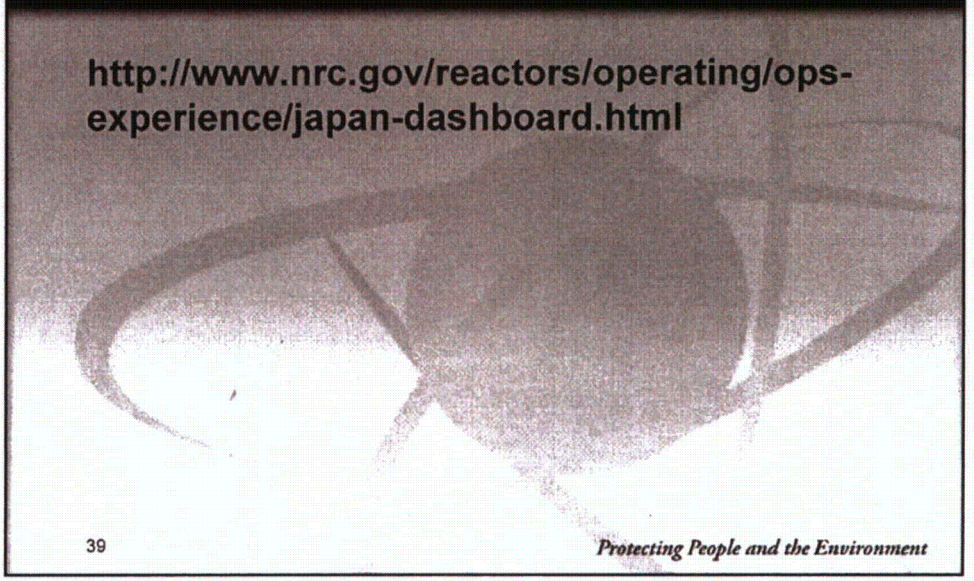
Protecting People and the Environment

For Additional Information

http://www.nrc.gov/reactors/operating/ops-experience/japan-dashboard.html



U.S.NRC
United States Nuclear Regulatory Commission
Protecting People and the Environment

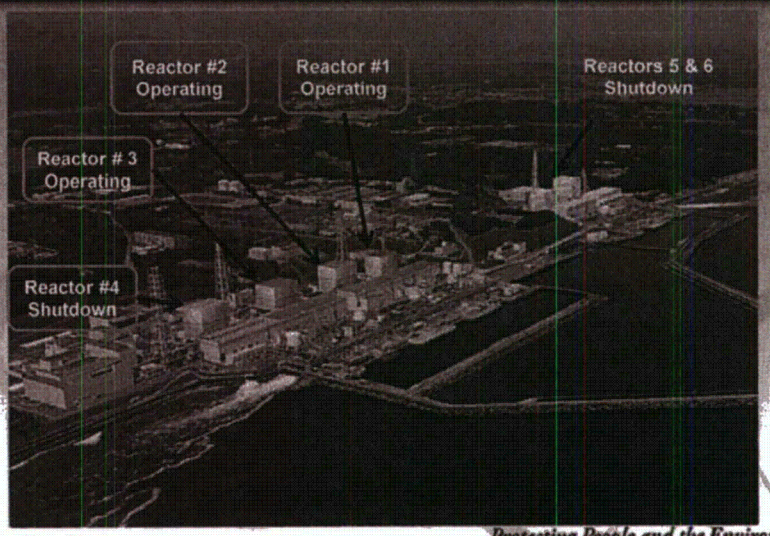
Japan and Fukushima Dai-ichi

Presentation to
Office of Nuclear Regulatory Research
All Hands Meeting

Steven West, Deputy Director
Office of Nuclear Regulatory Research

May 14, 2014

Fukushima Dai-ichi Before the Event



2

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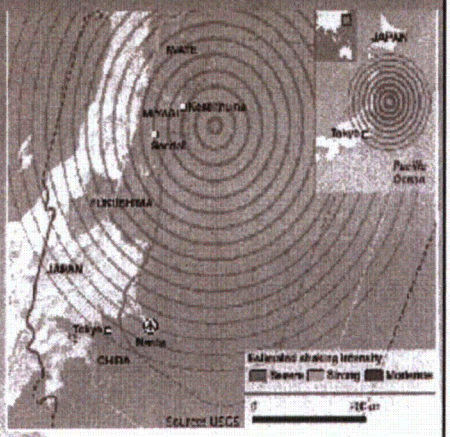
Earthquake

March 11, 2011
9.0 Earthquake

- 5th strongest ever recorded
- Epicenter 112 miles from site
- Shaking lasted over 3 minutes
- Moved Honshu island 8 feet east
- Shifted Earth on axis 4-10 inches
- Large aftershocks



Initial Plant Response

- Reactors shut down as expected
- Emergency diesel generators supplied power as expected
- Plant conditions stable and controlled

3

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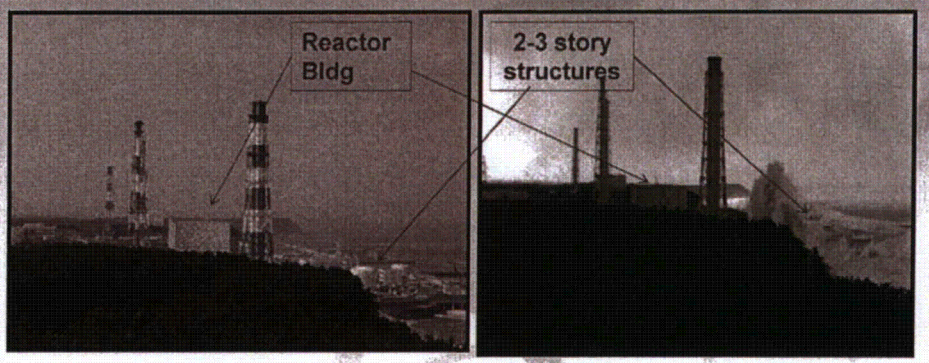
Tsunami

- Site designed to withstand 19 foot tsunami
- Hydrodynamic forces were not considered
- Actual height estimated 46 - 49 feet



4

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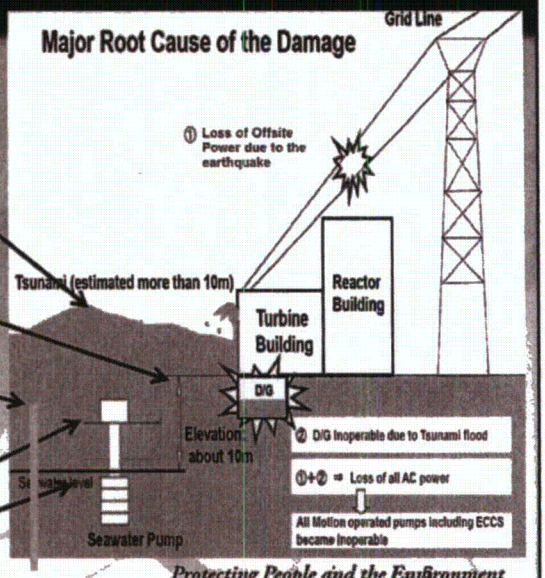
Flood Damage

Reference Levels

- 46 feet. Tsunami Peak Elevation
- 42.5 feet Ground elevation of Units 5-6 TB/RB
- 33 feet Ground elevation of Units 1-4 TB/RB
- 17 feet Assumed highest tsunami and elevation of break wall
- 13 feet Ground elevation of intake structure
- 0 Feet Sea level



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Site and Working Conditions

- High mental and physical stress, uncertainty and setbacks
- Many aftershocks and tsunami alerts
- Loss of ac and dc power impacted equipment, lighting, indications and communications
- Open manways and unsound terrain
- Debris, rubble and obstacles
- Respirators and protective equipment
- Elevated radiation fields
- Concern about family and loved ones

6

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General Accident Progression

- Plant status unknown or questionable
- Heat removal capability lost
- Reactor temperature/pressure rise
- Core uncovery
- Fuel cladding T > 2200 F → hydrogen
- Hydrogen migration, accumulation and explosions
- Elevated radiation levels

Unit 1

- Most severe conditions
- Intermittent injection and venting
- Possible reactor pressure vessel (RPV) breach or stuck open safety relief valve
- Fuel melt (about 4.5 hours after earthquake) and core damage
- Hydrogen generation and explosion
- Elevated radiation levels and offsite release

Unit 2

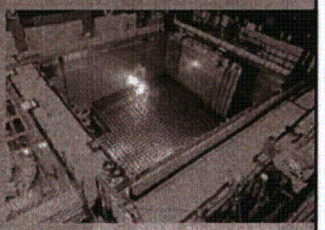
- Core injection for about 70 hours
- More time to prepare line-ups before doses increased
- Unit 1 explosion prevented core injection
- Unit 3 explosion damaged vent alignment and seawater injection staging
- Complications in depressurizing the RPV and venting containment led to core damage
- Elevated radiation levels
- Last core to melt – came close to saving

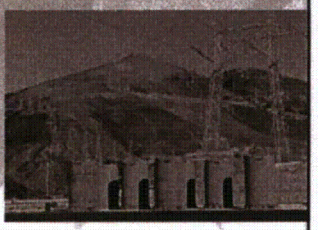
Unit 3

- Initial conditions not as severe as Unit 1
- Dc power available for about 30 hours
- Core injection available for about 35 hours
- Fire engine pump could not inject until the RPV pressure was reduced
- Safety relief valves could not be opened without ac and dc power and air
- After about 6 hours without injection → core melt (about 40 hours after the earthquake)
- Hydrogen explosion
- Elevated radiation levels

Unit 4 and Spent Fuel Safety

- Dry cask storage was flooded but fuel remained cool
- Spent fuel pools maintained structural integrity
- Unit 6 diesel generator provided heat removal to the Units 5 and 6 pools and the fuel in the cores
- Unit 4 spent fuel pool
  - Elevated temperatures was a concern
  - Hydrogen explosion due to backflow of hydrogen from Unit 3 gas treatment system
  - Concern diverted attention from the reactors





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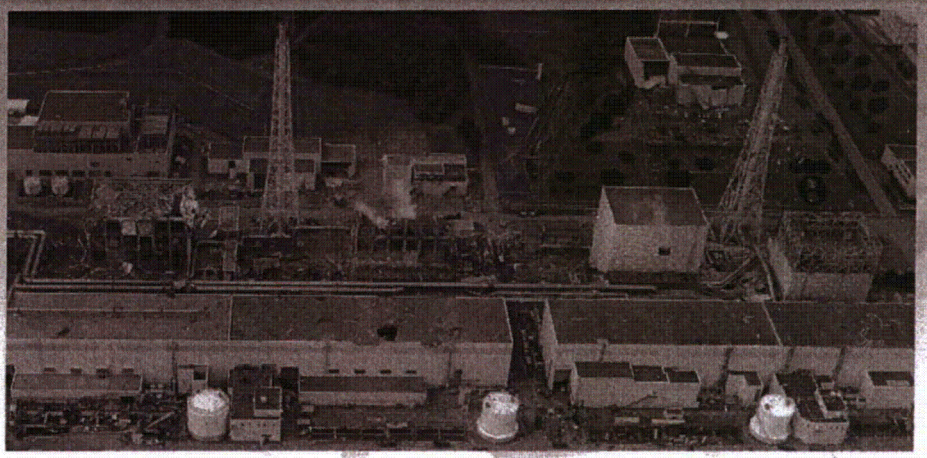
After Hydrogen Explosions



UNIT 4 UNIT 3 UNIT 2 UNIT 1

12

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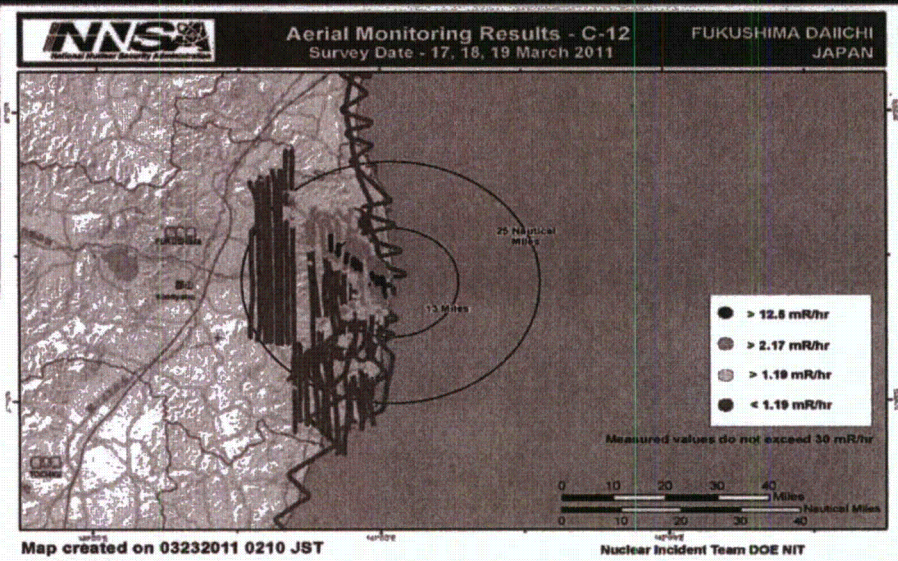
Radiological Release



Fukushima Dai-ichi Site Today

Removing Rubble from Unit 4
March 3, 2012

- All reactors are stable
- Fuel pool cooling is reliable
- Decontaminating water in 1000+ storage tanks and ground water control is a priority
- Releases do not pose a public health and safety concern
- Cleanup continues
- All six units being decommissioned (40 year project)
- 4,000 workers per day

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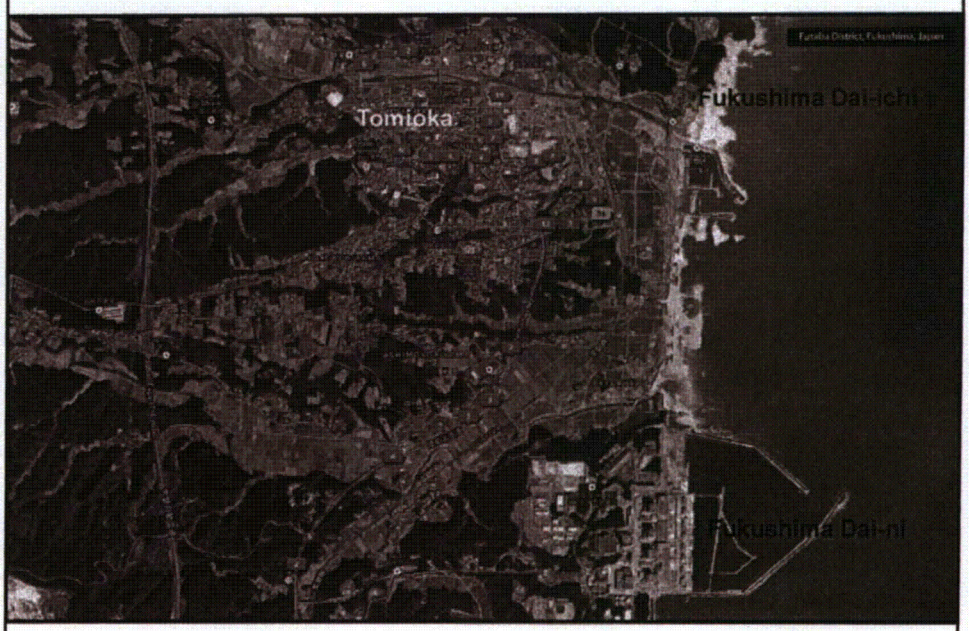
United States Nuclear Regulatory Commission
Protecting People and the Environment

NRC Executive Team Visit to Japan

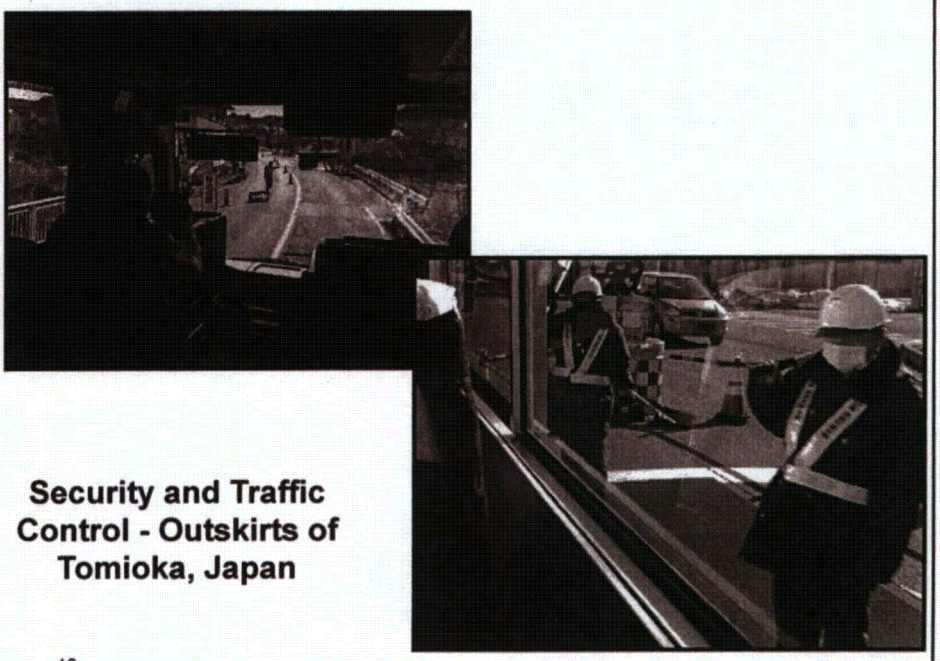


16

Tomioka Area, Japan, February 2014

17 J Village, February 2014

18 Between J Village and Fukushima Dai-ni, February 2014



Security and Traffic Control - Outskirts of Tomioka, Japan

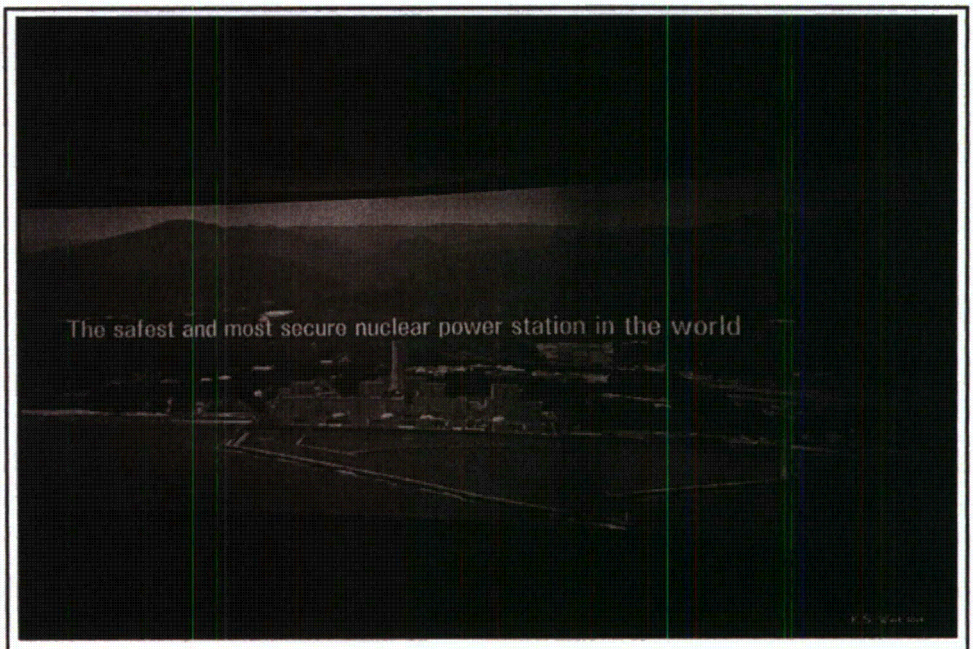
19

20

Tomioka, Japan, February 2014

21

Tomioka, Japan, February 2014



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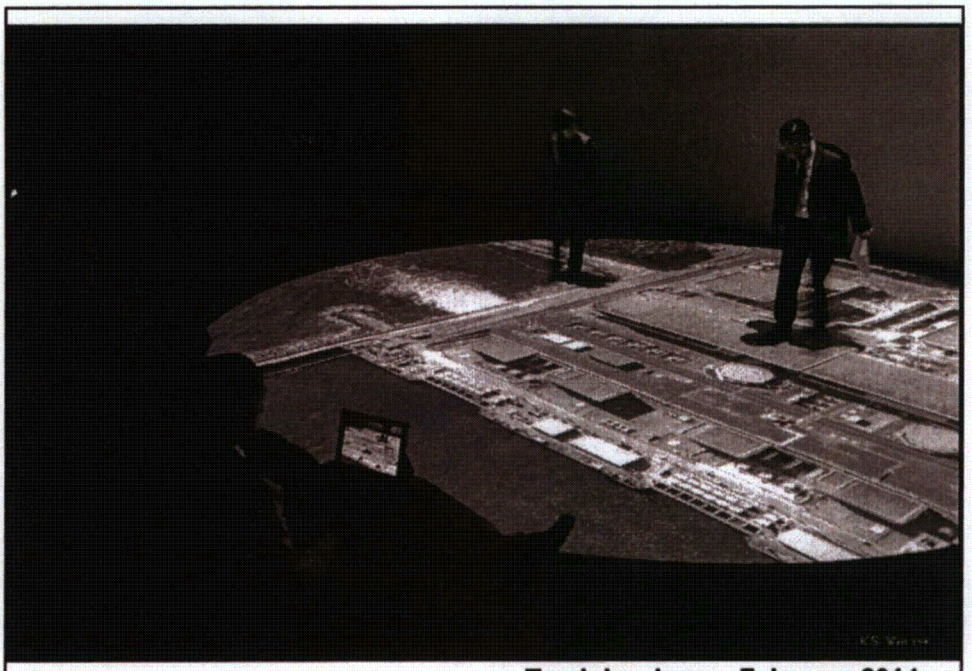
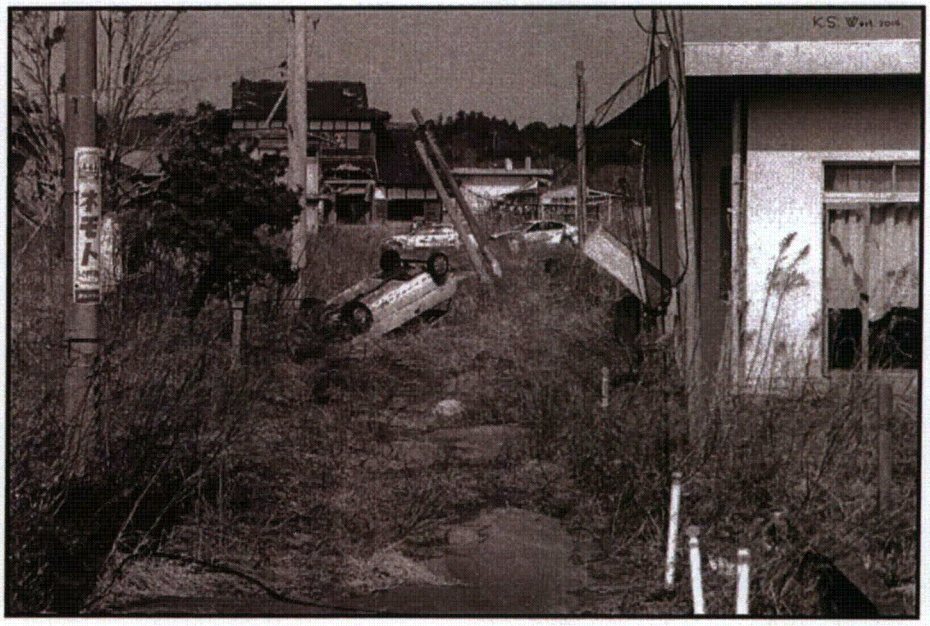
Tomioka, Japan, February 2014

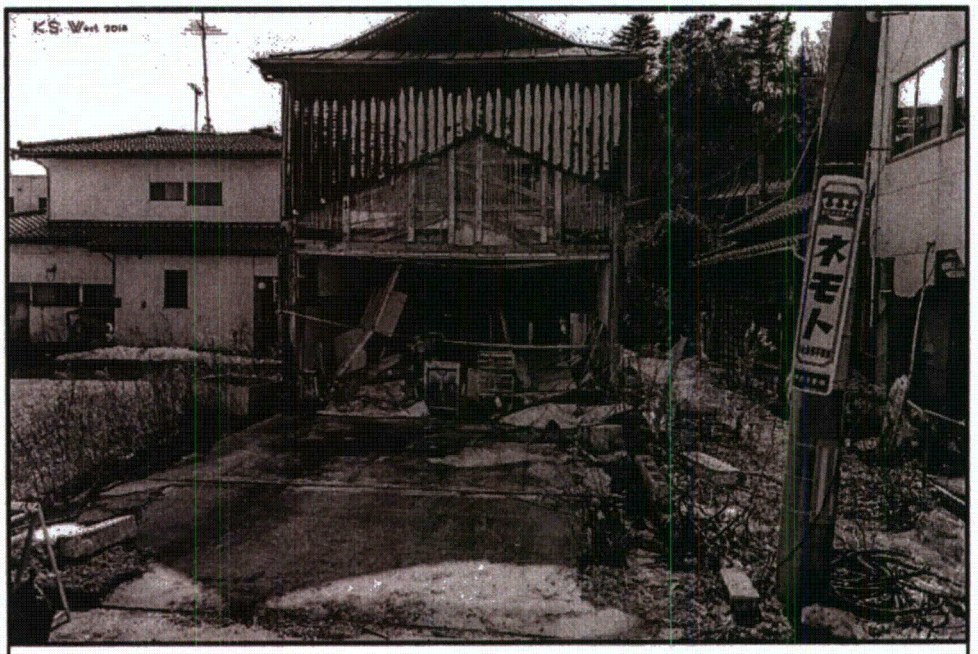


23 Tomioka, Japan, February 2014



24 Tomioka, Japan, February 2014

25 Tomioka, Japan, February 2014



26 Tomioka, Japan, February 2014

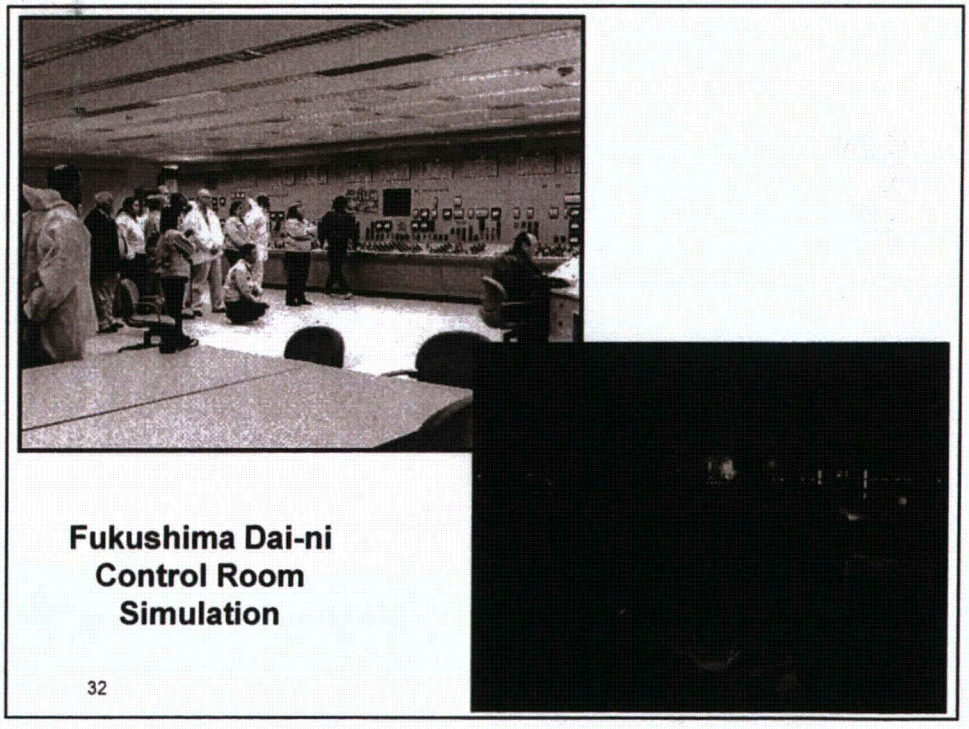
27 Tomioka, Japan, February 2014

28 Tomioka, Japan, February 2014

29 Tomioka, Japan, February 2014

30 Outskirts of Tomioka, Japan, February 2014

31 Cleanup and Decontamination, Outskirts of Tomioka, Japan, February 2014



Fukushima Dai-ni Control Room Simulation

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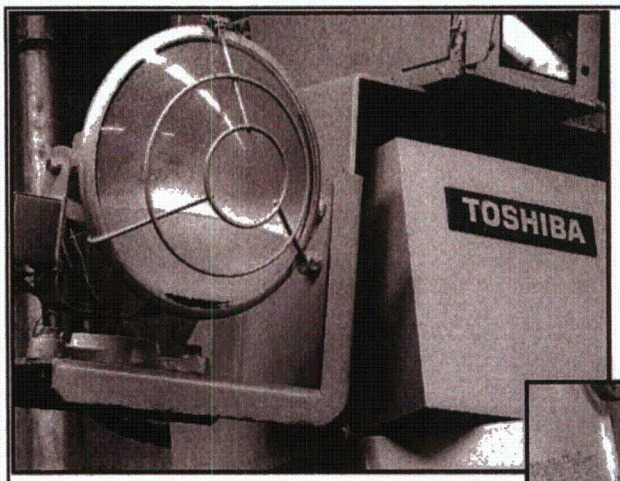

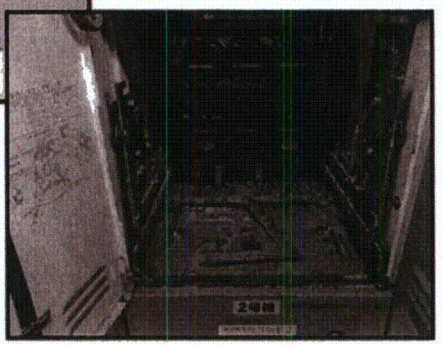

Fukushima Dai-ni
"Tsunami Water" and
Flood Damage

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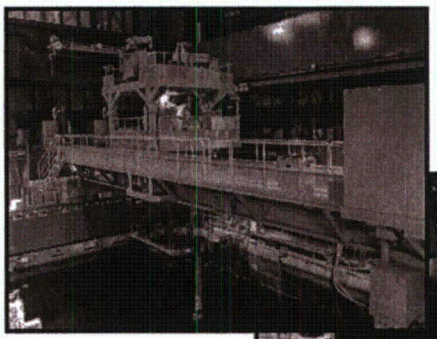
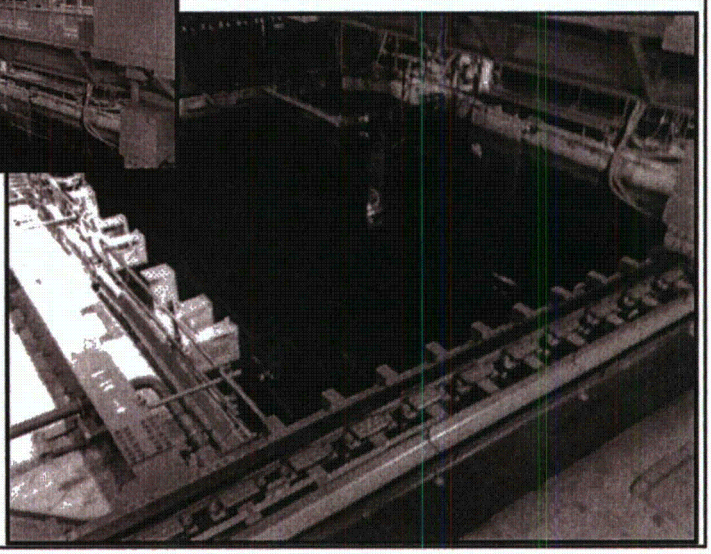


Fukushima Dai-ichi
Unit 4 Spent Fuel Pool



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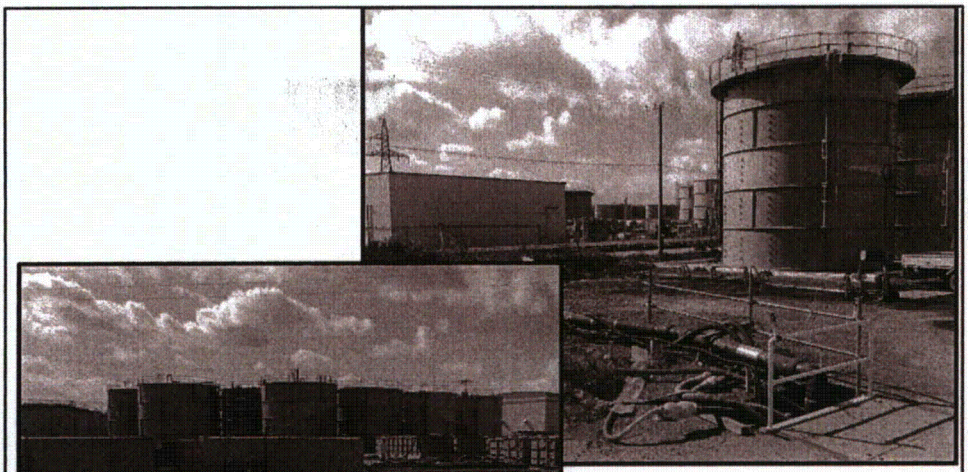

Fukushima Dai-ichi Contaminated Water Storage

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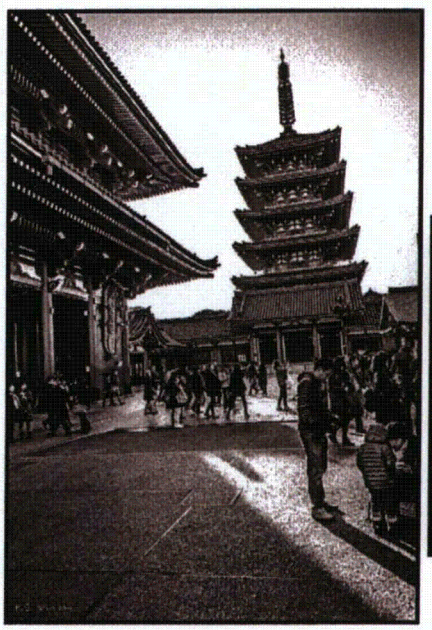

Sensoji Temple

Tokyo Marathon 2014

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Executive Team's Insights

- Ensure that the U.S. nuclear industry and the NRC are prepared for the unexpected.
- Ensure that U.S. licensees have a deep understanding of their plants and that both the NRC and the industry maintain technical expertise.
- Ensure that U.S. licensees fully implement, maintain, and appropriately exercise measures put into place associated with the post-Fukushima actions directed by the NRC.