(As published in The Oak Ridger's Historically Speaking column on July 3, 2020)

I was fortunate recently to attend a Zoom webinar where my friend, Clifton Truman Daniel, grandson of President Harry Truman, was featured by the Franklin D. Roosevelt Presidential Library and Museum in a discussion with Paul Sparrow, museum director. The topic was the decision to drop the atomic bomb on Japan.

They addressed both President Roosevelt and President Truman and their individual roles in the Manhattan Project's dramatic race for atomic power. The online promotion of the event stated, "The Manhattan Project's success would have been impossible without FDR's committed leadership; and Harry Truman's decision to seek an end to the war by dropping atomic bombs on Hiroshima and Nagasaki had personal repercussions for the president even as it transformed the world."

What intrigued me most was Clifton's description of his interaction with Japanese individuals and groups. He has spent considerable time with survivors of the dropping of the atomic bombs. The focus of his interaction is to help assure that nuclear weapons are never used again. He understands his grandfather's role in all this and also appreciates his opportunity to do something special as he interacts with survivors of the atomic bombs.

Clifton also has studied the specific details of his grandfather being the president when the atomic bombs were used. There is much more to the situation than just a simple decision to use the new amazingly powerful weapon. The study of that series of events has been going on since the day it happened and continues even today.

Carolyn Kraus brings us the third in a series of four *Historically Speaking* articles that show the broad spectrum of opinion regarding the use of atomic bombs and the end of the war with Japan. Again, it is not our intent to challenge your opinion of the effectiveness of the atomic bombs to end World War II, just to show you the perception of some segments of more recent researchers, authors and others regarding their use.

On Sept. 2, 1945, Japan formally signed documents of surrender, officially ending World War II. For most Americans, the bombing of the Japanese cities of Hiroshima and Nagasaki on August 6 and 9, 1945, triggered Japan's surrender on August 15. The popular view persists that without the A-bomb developed in the secret Manhattan Project cities of Oak Ridge, Los Alamos, and Hanford, the war would have dragged on for months in Japan, causing thousands of additional American and Japanese deaths.

However, those were not the conclusions of several papers delivered at the "Round Table: Hiroshima and the End of World War II" during the 17th annual conference of the Society for Historians of American Foreign Relations on June 19, 1991, in Washington, D.C. Some scholars there suggested that Japan was about to surrender before the A-bombs were used and would have surrendered before the U.S. invasion planned for that fall, according to *Genius in the Shadows: The Man behind the Bomb*, by William Lanouette.

Several historians maintain that the Soviet Union's massive surprise attack on Japan-occupied Manchuria on Aug. 8, 1945, had more impact on Japan's leaders than the bombings of Japan by the American military. (Manchuria was restored to China in late 1945.)

According to Historian Alex Wellerstein, whose articles and blog appear on the web, "For the Japanese, the Soviet Union's declaration of war at midnight on August 8 triggered a much more decisive response than the bombing of Hiroshima on August 6. Within six hours after the declaration, Japan's Supreme Council was convened to address surrender terms." The most authoritative argument favoring this view may come from Tsuyoshi Hasegawa's *Racing the Enemy: Stalin, Truman and the Surrender of Japan*, (Harvard University Press 2005), which is based on documents in Japanese, Russian and U.S. archives.

(As published in The Oak Ridger's Historically Speaking column on July 3, 2020)

It should be noted, however, that when Hirohito, the Japanese emperor, announced the surrender on the radio, he stated that "the enemy has begun to employ a new and most cruel bomb, the power of which to do damage is, indeed, incalculable, taking the toll of many innocent lives. Should we continue to fight, it would not only result in an ultimate collapse and obliteration of the Japanese nation, but also it would lead to the total extinction of human civilization."

The question of whether a demonstration of the atomic bomb, rather than use of it to destroy a city population, would have motivated the Japanese leaders to surrender continues to be debated by historians and other scholars.

In his thought-provoking article in March 2015, on "To Demonstrate, or Not to Demonstrate?", Wellerstein explored the history and motivations behind some Manhattan Project scientists' beliefs that the atomic bomb should first be demonstrated before being used on a city. As Karl Morgan, the first director of the old Health Physics Division at Oak Ridge National Laboratory, wrote in his memoir, President Truman was never told of the demonstration option.

"If an A-bomb dropped on an actual city was not, by itself, entirely enough, what good would seeing a bomb detonated without destruction do?" Wellerstein asked. "One cannot know, but I suspect it would not have done the trick."

Wellerstein and other scholars continue to write this century about the Franck Report, a document produced in June 1945 by a few scientists in Chicago who composed the Committee on Political and Social Problems. Nobelist James Franck, a German refugee, chaired the committee.

One of the scientists who signed the report was Glenn Seaborg, who co-discovered plutonium and pioneered the bismuth phosphate method of separating plutonium from spent uranium rods, as was further developed and demonstrated at the Graphite Reactor in Oak Ridge.

Once a month for a year, starting in September 1943, Seaborg visited Clinton Laboratories and the reactor, which went critical on Nov. 4, 1943. During his visits he stayed at the Oak Ridge home of his friends, Vance and Mary Cooper.

The signatories of the committee's report recommended that "a demonstration of the new weapon ... be made before the eyes of representatives of [the] United Nations, on the desert or a barren island." Later in the summer, Major General Leslie Groves, the military leader of the Manhattan Project, had the Franck Report classified as "secret."

The Franck Report is the subject of an Aug. 4, 2016, online report by Frank von Hippel, a scientist with expertise in nuclear policy and national security, and Fumihiko Yoshida, a visiting scholar from Japan at the Carnegie Endowment for International Peace. Their document is entitled "Why the United States did not demonstrate the Bomb's power, ahead of Hiroshima."

According to von Hippel and Yoshida, the Franck Report became the seminal document on nuclear arms control after it was published in the May 1, 1946, issue of the "Bulletin of the Atomic Scientists." The report, they wrote, "focused on the concern that revealing the bomb through a surprise attack on an already defeated Japan could make a nuclear arms race with the Soviet Union impossible to prevent.

The scientists argued that the military benefits of using the bombs would likely be small. "It is doubtful whether the first available bombs, of comparatively low efficiency and small size, will be sufficient to break the will or ability of Japan to resist, especially given the fact that the major cities like Tokyo, Nagoya, Osaka and Kobe already will largely be reduced to ashes by the slower process of ordinary aerial bombing. They also contended that use of the bombs could undermine chances of preventing future nuclear wars. And so, they advocated for a demonstration of the A-bomb's power."

(As published in The Oak Ridger's Historically Speaking column on July 3, 2020)

According to Wikipedia, the Franck Report "predicted a nuclear arms race, forcing the United States to develop nuclear armaments at such a pace that no other nation would think of attacking first from fear of overwhelming retaliation. This prediction turned out to be accurate, as the nuclear arms race and the concept of mutual assured destruction became a major factor in the Cold War."

In his 1994 book *The First Nuclear Era: The Life and Times of a Technological Fixer*, Alvin Weinberg, renowned director of Oak Ridge National Laboratory from 1955 to 1973, noted that, since the A-bomb was dropped on Japan, the world had adopted "a tradition of non-use of nuclear weapons" (Tom Schelling's phrase).

Weinberg agreed with nuclear scientist Leo Szilard's argument "that only actual devastation such as occurred at Hiroshima could have convinced the world – politicians, military people, the public – that a new age had begun. A test or even a demonstration could not have achieved this."

Observing that Hiroshima day, Aug. 6, was being commemorated by demonstrations, vigils and marches (especially at Hiroshima Peace Park and in Oak Ridge and other Manhattan Project "secret" cities), Weinberg realized that Hiroshima had been "acquiring a religious character."

During a visit to Hiroshima Peace Park on Aug. 6 when he marveled at the thousands of paper birds deposited at the traditional Hiroshima "bonshoo" bell, he asked himself: "Could I be witnessing the sanctification of Hiroshima? Was Hiroshima being transformed into a religious event – of significance comparable to the crucifixion or the Holocaust or the Hegira?

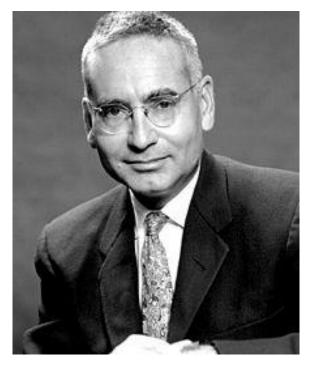
"Might not the tradition of nonuse become a taboo with religious power and character and therefore permanence? Was Hiroshima necessary? Yes, I now say, not only because it ended World War II, but because it was the unique, horrible event that may make the tradition of nonuse permanent."

Because of the connection between Hiroshima and Oak Ridge (which supplied the uranium-235 used in the "Little Boy" bomb that wreaked destruction on Hiroshima), Weinberg chaired the initial International Friendship Bell Committee that raised the \$150,000 needed to make and erect a replica of the Hiroshima "bonshoo" bell in the center of Oak Ridge.

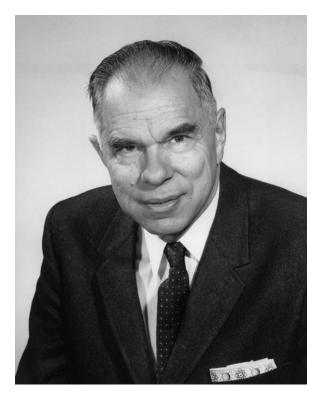
In *The First Nuclear Era*, Weinberg wrote that he hoped the Friendship Bell in Oak Ridge "will become a shrine for the many visitors who, by their pilgrimage to the Friendship Bell, will be participating in the sanctification of Hiroshima and the permanence of the tradition of nonuse."

Next, Carolyn brings us an article considering the aftermath of World War II and how much influence scientists may have had on policymakers. This will conclude the series of four articles on the introduction of the Nuclear Age.

(As published in The Oak Ridger's Historically Speaking column on July 3, 2020)



Alvin Weinberg



Glenn Seaborg