

Harold Brown, Oral History Interview—JFK#5, 6/25/1964
Administrative Information

Creator: Harold Brown

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Biographical Note

Brown, Director of Defense Research Engineering in the Department of Defense from 1961-1965 and Secretary of Defense from 1977-1981, discusses the U.S. and Soviet Union's nuclear testing, the debate within the John F. Kennedy Administration over whether to have atmospheric or underground testing, and negotiations leading to the 1963 Partial Test Ban Treaty, among other issues.

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Harold Brown—JFK#5

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Fifth of Six Oral History Interviews

with

Harold Brown

25 June 1964

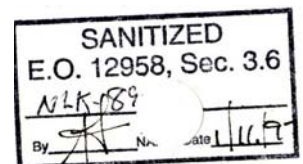
For the John F. Kennedy Presidential Library

INTERVIEWER: We have reviewed in the past the first National Security Council meeting that you attended in May 1961 where the issue related to the resumption of nuclear testing. I would like today, if possible, to get into the chronology that followed the attempt, first, to go through the resumption of testing, and the consequences of it, and second, go back a little bit and go up to the limited test ban treaty.

BROWN: As you say, I discussed the May 1961 meeting, in which I presented as best I could the pros and cons for resumption of U.S. testing underground or in the atmosphere, from a condition in which there was still a tacit moratorium, but the negotiations for an agreement were getting essentially nowhere. That was really an information meeting. There was no decision up at that time.

During the following several months in June, July, August, the Atomic Energy Commission and elements of the Defense Department, the military particularly, did raise the question several times as to whether nuclear testing should be resumed by the United States. In the absence of information as to whether the Soviets were testing secretly or not, and what people believed during that period really depended upon what they wanted to do, most of them.

In any event, there were several more meetings with



the President [John F. Kennedy] on the subject.

INTERVIEWER: You mean the pressure was to do certain specific things that these people wanted?

BROWN: Yes.

INTERVIEWER: This had nothing to do with whatever the Russians might be doing?

BROWN: No, what I said was that whether—people's own conclusions as to whether the Russians were testing or not tended to run along with whether they believed that we should start testing or not, and since there was no information that was worth anything, they tended to believe what their desires as to whether the U.S. should test or not wanted them to believe, or led them to want to believe about the Russians. Those people in the U.S. who wanted to test concluded the Russians were testing. Those who didn't want to concluded that they were not. But there was no information to say that they were or they were not.

INTERVIEWER: What were the reasons that were presented aside from what the Russians had been doing?

BROWN: Advances in tactical weapons in particular were one reason that was put forth. I know that this was something that particularly appealed to General Taylor [Maxwell D. Taylor], who was at that time the President's personal military advisor, and that on the basis that the Soviet manpower advantage forced us to have an advantage in materiel, and this was one kind. I

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think he has subsequently modified his view, as have many of us, about the relative position of the U.S. and the Soviet Union in non-nuclear war, although I think that—well, he would have to speak for himself, but he probably still believes that without nuclear weapons in Europe, the Soviets would in our present state of readiness still be able to push us out. Whether that has to be true indefinitely is not clear. It is certainly clear that it was much more true in 1961 than it is now.

Other reasons had to do with antiballistic missile development, large yield weapons development, nuclear weapons effects, clean bombs. I think all of these are reasons to test. The question always was what is the balance as between both of us not testing, or both of us testing, or us not testing and them testing to the maximum extent that they could test in secret.

A consequent set of questions, not subsidiary, but even more important, what effect does all of this have on the military balance, both strategic and tactical?

INTERVIEWER: So inevitably, and this is to restate what you said at the beginning, inevitably there is some consideration of balance. It wasn't merely the

attainment of specific objectives in the absence of whatever the Soviets were doing.

BROWN: Right. That is so.

INTERVIEWER: How did the President against these?

BROWN: I think that the President, President

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Kennedy started out with I think instinctive bias against nuclear—not bias, but with an instinctive feeling against nuclear testing. He felt very strongly about fallout, much more strongly, I think, than was justified on purely technical grounds, but obviously that feeling was not a misevaluation of the political situation at all. I think it was a correct evaluation.

So at all of these meetings, when arguments were presented on both sides and he was urged to have the U.S. break the moratorium, he always decided not to. I think he recognized from the statements that were made by Weisner [Jerome B. Wiesner] and myself and by McNamara [Robert S. McNamara] that however important the absolute gains might be from nuclear testing, the relative gains would be less; that is, relative to the Soviets, and so long as the Soviets were not doing more than they could do secretly, which I think he believed probably to be nothing, but even were they doing as much as they could do secretly, the military balance would not be changed by letting them do that while we did nothing.

INTERVIEWER: Do you recall what the evidence might have been as to whether they were testing or not?

BROWN: Well, there is very little hard evidence. There was an Air Force group which presented certain intelligence information which, however, didn't prove anything. Almost all of the people who argued about whether the Soviets were testing or not, on either side, argued in terms of what

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they ought to be doing. There were great gains to be made, so they must be testing, or there are no gains to be made and penalties are terrible if they are caught, so they are not testing. They were not arguing from the evidence at all. They were just arguing about what ought to be true.

INTERVIEWER: Who were the parties? How did they line up?

BROWN: You mean the individuals?

INTERVIEWER: Yes.

BROWN: The President and Weisner, McNamara, the CIA—although Allen Dulles [Allen W. Dulles], who was the director at that time, never really said anything very firm about it—all lined up on the side of not going ahead with testing, I mean not ourselves resuming testing. The Secretary of State [Dean Rusk], also, although somewhat more weakly. I think I would put myself also on that side, but not strongly.

The military, all the military, General Taylor, General LeMay [Curtis E. LeMay], very strongly, of course, the Joint Chiefs as a body, insofar as they expressed themselves, did tend to lean toward testing.

In the Atomic Energy Commission, the Commission itself was in favor of testing, but not very strongly, and some of the weapons developers in the Commission were much more strongly for it; the director of the Division of Military Applications was strongly for it in the AEC.

INTERVIEWER: Why do you put yourself and Secretary Rusk

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tentatively on the side of those against testing?

BROWN: That is just my memory of the way things were.

INTERVIEWER: You can see the ambiguities.

BROWN: I could see the ambiguities. The problem in my mind was from the beginning how to weigh a very small probability of a very important but unforeseeable gain from nuclear testing in the balance against all of the political problems, and also against the great difficulty of changing the military balance by any single event. I think I may weigh that differently now than I did then, but I was already then presented with the picture of the whole military technical situation, and so I didn't weigh it nearly so heavily as I had, for example—that is, a single nuclear development—nearly so heavily as I had when I was director of the Livermore Laboratory of AEC.

INTERVIEWER: But in that May meeting you say you took no position.

BROWN: I took no position.

INTERVIEWER: Where did Rusk take a position, and in what way, do you recall?

BROWN: I can't recall. I can only recall that he always in these matters tended to weigh the evidence of resolution which could be given by strong action of one kind or another, and their political benefits.

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Of course, the Arms Control and Disarmament Agency took quite a different view.

INTERVIEWER: Did the Committee of Principals exist at that time?

BROWN: Oh, yes, it antedates the Kennedy Administration.

INTERVIEWER: Was the issue ever joined at any time? Was there ever a final presidential ruling?

BROWN: No, there were a series of decisions in the spring that he was not going to resume nuclear testing.

INTERVIEWER: Was the AEC putting forth a formal proposal?

BROWN: Yes, but it was always put forward, if I remember, for consideration, and not as a recommendation. That is why I say that they were not or did not strike me as being strongly for it.

INTERVIEWER: The Russians said once they resumed testing that we were preparing to resume testing. Is there any truth in that?

BROWN: We had made it very clear as early as the Eisenhower Administration [Dwight D. Eisenhower], the last year of the Eisenhower Administration, during 1960, that we would get ready, but we did not, really, as was shown by how long it took us to resume atmospheric testing, once the Soviets did start, and how long it took us to resume large scale underground testing, which is a part of a story which I will get to in a minute. But there was a

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decision in 1959, the end of 1959, to get ready for the resumption of underground testing. But that decision was really not implemented during 1960 because of fear of public reaction, and justified fear of public reaction, international reaction, if we started to get ready. I remember this from the other end.

INTERVIEWER: Were they obvious when they started preparing?

BROWN: Well, there were, for example, proposals to start laying cable in tunnels in Nevada, and that was turned down on the basis that it would be too public. I don't think the physical actions would have been public, but I think it would have been impossible to keep some clever newspaperman from finding it out. It would have made a very good story for John Finney.

INTERVIEWER: Prior to September when the Soviets resumed testing, were there any decisions made other than that we would not resume testing?

BROWN: No, and there was no expansion of a readiness program, really. The existing program did include some elements of getting ready, but very little, and there was no real change in that.

Well, these deliberations were all very rudely interrupted, I guess it was at the very end of August, or the beginning of September. It was within a few days of the August-September demarcation line. The Soviets announced that they

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were going to resume. Now, this had not really been heralded by any nuclear action. I think the Berlin crisis of 1961, if I remember correctly, had happened, had really started to blow up just a month or so before, following the Kennedy-Khrushchev [Nikita Sergeyeovich Khrushchev] meeting in June in Vienna. But I think that everybody in Washington, including the people who said the Russians had been testing all along, were rather shaken by the blatant manner in which they did it. In fact, the CIA later announced that it had seen signs [REDACTED] but it had not said anything about them until after the Soviet announcement, which leads me to question whether the signs were useful. I don't think they were.

INTERVIEWER: [REDACTED]

BROWN: [REDACTED]

INTERVIEWER: You said that the President was personally furious.

BROWN: I had never seen him any madder than that. He was very, very angry. I think he obviously felt that he had been treated as a sucker by the Soviets. He later cooled off about it. But he was very, very annoyed those first few days.

INTERVIEWER: When did you see him during those days, do you remember?

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BROWN: Yes. I don't remember the exact chronology but I do remember we found out about it one afternoon. Some clever listener at an American communications station which picks up the open Russian foreign broadcasts, that is the Soviet broadcasts to abroad, had picked it up. I think he was on Cyprus. There was no intelligence business about this. This was an open transmission which said they were going to resume, and I think for about an hour nobody believed it, but then it was rebroadcast by Moscow radio, having first been broadcast by some more obscure place,

and people did start to believe it. McNamara and I got together and started to make up an announcement to be issued by the White House, but we found that we had been scooped by the people over in the White House, who had gotten the President to issue something earlier.

The only thing about it that I thought was a mistake was it laid great stress on pollution of the atmosphere, which as I say I have never been able to—an indignation which I have never been able to justify on technical grounds, although it may well be justifiable on other grounds.

INTERVIEWER: Two years later, incidentally, that was one of the themes on which Kennedy tried to sell the limited test ban treaty.

BROWN: That is right.

INTERVIEWER: He apparently, as you say, believed it quite strongly.

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BROWN: He believed it strongly, and I think it had and has a lot of political appeal, and there is a reason for it. Either the next day or the day after that—well, I think that first appeal said please stop, stop right away. It called on the Soviets to stop. They responded by exploding a bomb, and then we issued another appeal to them to stop, and they exploded another bomb. I think this was all in the space of a couple of days. Then he said—there was a meeting in his office of about half a dozen of us, a couple of people from AEC, Seaborg [Glenn T. Seaborg] and Betts [Hans A. Bethe?] I guess, and Gilpatric [Roswell L. Gilpatric] and myself, with Bundy [McGeorge Bundy] and President Kennedy, in which he said, “Okay, how soon can we get ready?” It was really up to the AEC. They had development shots ready. We had not had any underground shots ready. What we had done was kept planning for an atmospheric series, which is where we wanted to make our effects tests.

He said, “How soon can you have one ready?” Seaborg said, “Well, we can have one ready in a few days.” He said, “How big?” He said, [REDACTED] He said, “That is no answer. That is nothing. That hardly would shake the walls in this room. How soon can we have one of [REDACTED] ready, [REDACTED] ready?” I forget what the answer was, but it was several weeks, and even that one was not a new experiment. It was just something they were able—a standard bomb that they would bury and set off.

INTERVIEWER: Why didn't they just explode a bomb?

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BROWN: That is what they did, but it takes a while. The decision was to go ahead with underground tests, and what he said was, “If they explode one more in the atmosphere, we will start an underground series.” But [REDACTED] was not much to start an underground test series with. No one would notice. So we did get one up, or AEC did get one up of [REDACTED] within I think a week or so, a

week or two, and that is how we restarted underground.

INTERVIEWER: Did he want a useful test, or did he just want a noise?

BROWN: Well, he preferred a useful test, but it was clear that he would settle for a noise.

INTERVIEWER: This sounds like a very instinctive reaction.

BROWN: It is a required political reaction.

INTERVIEWER: We have no contingency plans for what we...

BROWN: Sure we do, but we had none that went into operation a day later.

INTERVIEWER: Why was that? Was it just not envisioned?

BROWN: Any contingency plan which would have had us ready a day later would have been very provocative a day before. At the time, everyone including the President was very annoyed at this, but I think looking back on it, I think that is all right. It turned out all right. It was probably the right way to behave, or to have behaved, although it certainly did not seem that way for a couple of days, or even a couple of months.

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INTERVIEWER: When was the first nuclear shot after the Soviet resumption?

BROWN: It was within a month. Actually the first one I think was within a week, but that was [REDACTED] one. I think the [REDACTED] one, or the [REDACTED] one was within a month. So that we then started popping them off underground during September, October, and November, and the Soviets kept on exploding bigger ones and bigger ones in the atmosphere, including, I guess, their—culminating with their 100 megaton, which was really a 58 megaton, [REDACTED]

[REDACTED] Also they had several effects shots, relative to the ABM problem, although not system shots. Then they finished.

Then the question was, should we keep on doing underground shots, which we kept doing all during the winter of 1961, or should we also do atmospheric shots?

INTERVIEWER: Why was the question only arising at that time? The way you put it, you suggested—this may not be what you mean to suggest—the question of doing atmosphere shots didn't come up until after the Soviets finished theirs.

BROWN: It came up—I am sorry. It came up, of course, as soon as they started testing in the atmosphere, but doing underground shots to respond, and actually getting a big underground series occupied enough of our attention so that we

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knew we could not do a reasonable atmospheric series until the following year in any event. So we started getting ready right away for an atmospheric series.

INTERVIEWER: The atmospheric series, aren't they the easier ones to do?

BROWN: No. It is true, it is easier to set off a bomb in the air than it is to dig a hole, but once you have got the holes dug, it is just as easy to set the bombs off in the holes, and if you are doing tests in the atmosphere, you are doing them because you can't do them underground. There are various reasons for that, why that may be so. One has to do with their size; it may be their size is too big to do underground. It may be that you want to do atmospheric effects tests. If you want to do effects tests, then you have to have an enormous quantity of equipment, boats, ships, radars, all kinds of stuff, and that takes lots of time.

INTERVIEWER: It seems to me that at some point along this spectrum from May to December, there could have been a decision to respond with an atmospheric series.

BROWN: Yes.

INTERVIEWER: As soon as the Soviets started theirs.

BROWN: That alternative, however, did not present itself in a yes or no form until late in 1961 because we agreed that it would take us—everyone agreed that it would take us nine months to get ready for an atmospheric series, and

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we started to get ready right after the Soviets began testing. The question then was not whether we should get ready or not, but whether we should do it or not. That decision did not have to be made until the following years, until a few months before you do the tests.

INTERVIEWER: Why didn't it have to be made?

BROWN: Because you could make your preparations right up—well, we had accelerated them right up as far as we could. The preparations were

going as fast as they possibly could. Three months before you did the series, roughly, you would have to tell people that you were going to do them, or else delay them. But until then it didn't make any difference so far as the tests themselves were concerned. Now, for political reasons you could have decided that you wanted to announce that you were going to do them, or you could have decided that you did not want to announce them. It was decided that we would not make the decision because we would continue to press for a test ban. In fact there was a whole series of discussions at the White House with the President that lasted through December, January, February and March, first as to whether we should offer the Soviets a test ban again. In other words, they now had made a big atmospheric series. We had made a small underground series. Were we still willing to sign the same treaty? That was the first question.

Then second, after it was decided that we were

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still willing to sign the same treaty, should we then—and the Soviets said no, they would not, they still would not, because of the inspection issue—should we then go ahead and start testing in the atmosphere, and that was finally decided yes. But you see you had to go through both of these things before you made the final decision.

INTERVIEWER: Was an assessment of what the Soviets had accomplished made?

BROWN: That was of course the first order of business in deciding whether to offer them a treaty, and the President constituted a committee for this purpose. Who were they? Well, I remember that Seaborg and...

INTERVIEWER: Weisner was Chairman.

BROWN: Weisner was Chairman, and Lee Haworth was a member and I was a member, and I am not sure whether Jerry Johnson was a member, too, but anyway, Pete Scoville was.

INTERVIEWER: For the CIA?

BROWN: For the CIA. I am not sure who else was in the act. But anyway, it was a technical evaluation committee to evaluate the effect of the Soviet tests.

INTERVIEWER: When was your evaluation completed?

BROWN: I would have to go back and look at the documents, but I think it was probably in January or February, something like that.

INTERVIEWER: Did it really bear on the final decision

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when it was finally completed?

BROWN: Yes, because remember, the decision that had to be faced first was, do we go back and do we try to get the Soviets to agree to a comprehensive test ban. We had offered them an underground test ban immediately after they began atmospheric testing, if I remember correctly. That was one of the things that happened during that month. There was a repetition of a previous several-times-made Eisenhower offer to have an underground ban, well, the kind of ban we finally got, in fact, except that those in and above ground...

INTERVIEWER: Underground.

BROWN: Right. But those earlier offers had included ground stations, and so on. This offer included, well, I don't really recall. I do know that before we resumed testing, we offered them a comprehensive ban, and we offered them an everything-but-underground ban with external verification.

INTERVIEWER: In this process of withholding the option to go ahead with atmospheric testing...

BROWN: No, retaining the option, and withholding the decision.

INTERVIEWER: Kennedy must have been under tremendous public pressure and congressional pressure, although—or was this deflated by the revelation of how difficult it was to begin testing overnight? Do you remember how this was handled?

BROWN: I don't remember how much of an issue it was.

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I think the fact that we started underground testing, which had been widely advertised as being able to do quite a few things, which it was and is, took the immediate heat off. You see, that carried us through the fall, and when we said—we could say we were making full-scale preparations, and that took the rest of the heat off.

INTERVIEWER: Full-scale preparations for what?

BROWN: For atmospheric testing.

INTERVIEWER: But no decision.

BROWN: Right. But then the following spring, the question came up, and as I say, first, do we offer them a complete test ban again—the Soviets—and this group, of which Jerry was Chairman, made the evaluation and said we were probably still ahead, although they had made big gains, and we could—well, it didn't make any recommendation. It was just an evaluation of where we stood, where they stood, as a result of the fact that they had gone ahead and tested.

INTERVIEWER: Was this a unanimous evaluation?

BROWN: You are always unanimous, but what happens is enough weasel words get put in so that everybody can agree. And there is in the end generally very little argument about what the technical situation is—that is, what kind of weapons do they have. There is some uncertainty, but everybody agrees that there is an uncertainty. There is more argument about how much—about the military situation, the effect on the military.

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Judgments come in there. But even when you put that in, you haven't answered the question about what you should do, and...

INTERVIEWER: That was not the question that this group was posing.

BROWN: No.

INTERVIEWER: But they were presented with the first two?

BROWN: Yes. Yes. But then the President and his advisors were presented with the question of, well, can we afford this one lump, effectively? Can we afford to allow them to catch up as much as they have on us? I gave a technical evaluation and Weisner gave a technical evaluation. We agreed. Then I think I have related this before. The President went around the table and asked whether we should give the Russians another chance. Secretary Rusk said yes. If I remember correctly—I don't remember what the AEC said. I do remember that McNamara said, "Yes, we should." Gilpatric said, "Yes, we should."

INTERVIEWER: Yes, we should give them another chance, or yes, we should test?

BROWN: Yes, we should try to get a treaty, and I said yes, we should. General Lemnitzer [Lyman L. Lemnitzer] said, "No, we should not." I think that McNamara, Gilpatric and I all had the same reason. We obviously had lost militarily from letting them test and not testing ourselves, but we felt that a comprehensive test ban which would allow inspection was worth getting so much

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that we could afford to give up what we had lost in the way of relative military posture, so we were still clearly ahead except in the very high yield technology, 50 and 100 megaton bombs, which we didn't quite understand the military purpose of and still don't, and that the political gains were very large, possible political gains were very large.

INTERVIEWER: You were making a political assessment?

BROWN: Yes, I said so.

INTERVIEWER: What did Adlai Stevenson [Adlai E. Stevenson] say?

BROWN: He was there, and he was for giving them another—for trying to get a treaty. I think everybody was.

INTERVIEWER: Do you remember what month this was in?

BROWN: I think it may have been in January. The announcement about resumption of testing was on April 2nd, a speech on April 2nd. I remember that. But I think this was well before, because they stalled for quite a while after we made the offer.

INTERVIEWER: You also attended a meeting with Lord Hume and Macmillan [M. Harold Macmillan], didn't you?

BROWN: That was in December. That is right. That was in December, and the President at that time made it clear that he might have to resume testing; that is to say, that if the Soviets did not now agree to a test ban, he might have to resume testing in the atmosphere. In a very real sense, both of these decisions were made at the same time, that we would get

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ready and we probably would have to test in the atmosphere, but we would give them one more chance for a test ban treaty. These were presented to them at the same time. That is, these statements, these considerations were considered by the President together, and if I remember correctly, we stated them to the British together.

INTERVIEWER: Did you actually think the Russians might accept the comprehensive treaty, or were you thinking about good propaganda?

BROWN: No, I think we felt there was some chance. After all, they had gotten something out of this.

INTERVIEWER: To your recollection, by this time had they made any concessions on

the number of on-site inspections? Were they talking to us about it?

BROWN: I just don't remember. You see, they said three, and then they said none. I think what happened was they were still saying three. I just don't remember.

INTERVIEWER: How did the British impress you at the meeting? What was their role? Why were they talking to the President?

BROWN: Well, they were arguing couldn't we really get by without inspections. I think they were trying to dissuade him from resuming atmospheric testing, whether we had an agreement or not. Bill Penney was there, Sir William Penney [William George Penney], the weapons member of their Atomic Energy Authority. He had

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been one of their negotiators in Geneva. Seaborg was there. I was there. Penney talked about the effects tests and ABM as being the principal regions of uncertainty. You see, it became very clear that we could live with what had happened, but the question was could we live with another one. That is, supposing that they would not sign a comprehensive treaty, and they got ready another test series, which they obviously had been able to do once, and we got caught short again, what would the problem be? I had serious problems with that.

INTERVIEWER: Wouldn't that be time enough to resume testing in the atmosphere?

BROWN: You mean the way it had happened before?

INTERVIEWER: Yes.

BROWN: You see, what that does or what that would have done, they made a big gain once, and remember, we had not resumed atmospheric testing. The question was to give them another bite. I think I felt that that would be very dangerous militarily. I still think it would have been a mistake from a technical and military point of view. But I think that in the end the President was probably as much influenced by political as any other considerations. To have let them get away with it once and resume testing ourselves would have been one thing. To have continued a unilateral moratorium under a situation by which they were obviously not bound, because they had not been bound once before, would have been politically very

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damaging if they had resumed again.

INTERVIEWER: Domestically or internationally, or both?

BROWN: I think domestically, very much so. I have a feeling that Secretary Rusk considered the same thing to be true internationally, which is why he finally came down on the side of resuming in the atmosphere.

INTERVIEWER: Back to the meeting with the British, you wanted something from the British, didn't you?

BROWN: I think what we wanted was their understanding.

INTERVIEWER: Didn't you also want Christmas Island?

BROWN: Yes we did. In the event I think we could have done without it, but we did want it. It was part of our planning. It was a big atoll. You see, we didn't want to use trust territory. We didn't want to use Eniwetok because of international complications, and Johnston Island, which we did use for our effects test, was kind of small for some of the larger yield development shots we wanted to do.

INTERVIEWER: You could have done it at sea?

BROWN: Yes, but that would have been more complicated. Instrumentation at sea is harder. If we ever resumed again, I think we would do it from sea, because I think we have since decided that political complications are always more difficult than technical complications. But on short notice in particular, and we were on short notice, being able

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to operate from land and on land was very valuable.

INTERVIEWER: What kind of political complications came up with the British? Any other than those you have mentioned?

BROWN: Well, particularly I think they wanted veto power on our test series. That is, they wanted us to explain why we were doing our test series, and the chance to say whether they thought it was important enough or not to do. Now, there were some security problems here, although we have been very free with them, and still are, in all of our nuclear developments. The agreements had been signed in such a way as to allow only post disclosure, not prior disclosure, and so that was a problem.

INTERVIEWER: How was the result?

BROWN: They didn't have a veto because we did change the series somewhat, but they were kept informed of any changes, and given a chance to

complain. They never really did. But that was a political complication.

INTERVIEWER: Do you remember what the package was that was made up finally?

BROWN: I remember there was a document. I remember there were four pieces to it, but I don't remember what was in each paragraph.

INTERVIEWER: But the overall criterion was that the megatonnage in the atmosphere...

BROWN: Yes, would be less than a certain amount.

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I forget how much. Ten megatons, something like that. Less than one half of what the Soviets had, about a third. He felt rather strongly about this.

INTERVIEWER: But individual tests were policed, weren't they, and made a strong justification of each one?

BROWN: That is right. We had to come in with a strong justification for each one. Incidentally, all of this went on before any final decision was made. What happened, as I look back on it, there was an obvious stone rolling down hill effect. I mean we got readier and readier and readier, and several times tentative decisions were made with the statement "Now, this isn't a final decision; this is a tentative decision. It will have to be reexamined." That did happen several times, that it was reexamined, but more and more preparations had been made. The same things that impelled us at the beginning didn't change, and so it got harder or it would have been harder for him to say no at the end than it had been in the beginning.

INTERVIEWER: When was the final decision made?

BROWN: It was made in March of 1962, and I don't remember the exact date. I could look it up on my little list of dates.

INTERVIEWER: You could put that list in.

BROWN: Yes.

INTERVIEWER: Were you ever present when Adlai Stevenson expressed contrary views? Did he express contrary views to your

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knowledge?

BROWN: He expressed reservations. He never said, "No, don't do this." I think the kind of thing he said, and the President had him over for lunch, and then had me and Weisner talk to him, I remember that, was, "Gee, do you really have to do this? It sure is going to have negative consequences." But I don't think he ever said, at least in any meeting at which I was present, "No, don't do this."

I think Jerry Weisner expressed the same kind of reservations. He said, "You can live without doing this, that is to say, militarily you can stand this, even if there is another go-round. You probably can stand it." My own reaction at that time was that it was dangerous to give the Soviets another chance to make another big step. It was again a small chance of a large consequence. But I think in the end the President was swayed partly by what I said about the effects test, the ABM, investigations that we felt we needed to do, and so on, and partly by the political considerations, both internal and external.

INTERVIEWER: Did he make a good decision?

BROWN: Looking back on it, I think he did. I think he himself had subsequent doubts about it, because on a trip—you see, we then went ahead and had our series, and I think we learned quite a lot. I don't think we learned anything that was startling new. That is to say, this one

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percent didn't turn out. We had our troubles with the high altitude tests, which I felt were the most important, and still feel that way. On a subsequent trip, when we were talking about another subject, he said, "Some time we will have to talk about nuclear tests and see whether it really made any sense to do what we did." But we never did get around to doing that, to talking about it, that is.

But looking back on it, I think he made the right decision, because I don't think we would have gotten any nuclear test ban, partial nuclear test ban otherwise.

INTERVIEWER: What is the logic of that?

BROWN: Well, if the Soviets had known that they could test in the atmosphere any time they wanted to, and we would keep on testing underground, why should they sign a test ban? I think in the end we were all kind of surprised that they did come around to an underground test ban. Of course, they did one more series after we did, you remember, in the atmosphere, did some more high altitude tests, did some more big bomb tests, made some more gains, and we decided that we could stand that. We had decided, remember, that we could stand one Soviet atmospheric test, and none for us, if we could get a test ban afterwards. Well, we decided that we could stand two for them and one for us, if we got a test ban afterwards, and that is what we finally got, although it was only a partial one.

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INTERVIEWER: Did your standards change any? Did the political factor drop out the second time around?

BROWN: No. Remember the decision was the same decision. We decided that we could stand one Soviet test series in the atmosphere, and none for us, after the moratorium, if we got a test ban, but the Soviets turned that down. So we had an atmospheric test series, and then they had an atmospheric test series, and then we made the same offer.

INTERVIEWER: Why didn't you then think about the ratio of three to two or three to one?

BROWN: We were willing to accept—just a minute. I am not sure you have gotten this right. We were willing to accept a test ban when they had had one and we had had zero, which is a rather large ratio, and of course that involved the prospects of two and zero, but we were not willing to accept that without a test ban, a document, an agreement. So we then changed the numbers to one and one, or a prospective two and one. Now, the second one happened. They went ahead and had two and one.

INTERVIEWER: Then with two and one, you had the prospect of three and one.

BROWN: We considered then just as we considered before that the prospect of them breaking the agreement was something we could take if there was an agreement, but we would not accept a prospect of them breaking a moratorium. In other

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INTERVIEWER: At what time was the second treaty proposed, after their second series was completed?

BROWN: That was the fall of 1962, or winter of 1962, September, October, November of 1962.

INTERVIEWER: Well, just following up this logic, if you could give it to me, it seems that at that time we would have been confronted with the same kind of question.

BROWN: Yes, as to whether we should have a test ban under those circumstances.

INTERVIEWER: That is right.

BROWN: We came to the same conclusion as we did before, namely, that we should.

INTERVIEWER: But they were not buying anything.

BROWN: That is right.

INTERVIEWER: At the beginning of 1963, they withdrew their offer of three.

BROWN: That is right.

INTERVIEWER: So by this time, it seems to me, having lost the immediate prospect of a nuclear test ban, we once again would be confronted with the decision of whether the potentiality of a three to one test ratio would be something that would hurt us, and whether we should then preempt and go to a two to two series.

BROWN: If the Soviets had not accepted a test ban, I think we might very well have done that.

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INTERVIEWER: But the pressure was not that way. There was a difference of perhaps six months in time.

BROWN: Well, the political...

INTERVIEWER: Is this actually the question I am raising or...

BROWN: No, I think it was real. I am trying to remember the situation. I think that the political pressure for—the international political pressure against testing was probably much greater at the end of all these test series than it was at the beginning, and I think that might have inhibited us.

INTERVIEWER: But we also had our Cuban success at the end of 1962.

BROWN: Yes.

INTERVIEWER: If you evaluate success in one area and failure in another...

BROWN: You remember our own test series ran over. It was supposed to be only six weeks, and it turned out to be about four months, because of troubles we had with some launchings. So in the end we finished at about the same time they did. We finished just before Christmas of 1982, and they finished I

think just after Christmas. They ran on into the very beginning of the new year, and then they stopped and we stopped.

INTERVIEWER: That overrun was quite a long time. Wasn't

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it timed initially to wind up in the summer?

BROWN: In the summer, and we didn't really finish until November or December. So it actually overlapped the Cuban Missile Crisis.

INTERVIEWER: Subsequently in the debate over ratifying the test ban, Teller [Edward Teller] made accusations, along with others, that we did not have an effective test series, because of our—I suppose you could put it in terms of our shilly-shallying in 1961 and 1962, we had not prepared for an adequate series. Was there any truth to this? Was the 1962 series entirely successful?

BROWN: Well, there are a number of questions there. First of all, did we prepare? I think the answer is that we were unprepared in 1961, but we then made the best test series that we could in 1962. Not all of the questions that we hoped to answer got answered, and some of them got answered in a way that was rather disappointing. Things were less important or less useful than we had thought. I think he may interpret that or may have interpreted that as unsatisfactory. You know, when you do an experiment and you want it to come out one way but it doesn't, that is a bad experiment.

I think he also made another charge, which was that there was political constraint on the series. That was the more serious charge—that the series should have included some shots which it didn't include because of political limitations. I

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don't think that is a proper description of what happened. I think there were constraints on the series. There are always constraints, budgetary constraints, programmatic constraints, and the people whose favorite experiments don't get put in always cry foul. But I don't think these were much more severe than they would have been in any circumstances.

INTERVIEWER: Did he have favorite experiments which were not done?

BROWN: Not until afterwards. There were experiments that I think he would have liked to have added, experiments in fact that he would have liked to have done in a subsequent series. I think the President handled that very well in one of his press conferences when he said, "There are some people who are just never satisfied." And it is true. There are always more things to learn, but it is up to the President to weigh what is still to be learned against, and its effect on the military situation,

against political considerations.

INTERVIEWER: What were these things that generally could have been done but were not in the 1962 series?

BROWN: Well, I think you could have done more work on heavily instrumented shots in the ionosphere, to see about nuclear blackout. Now, we actually did cover that, but we didn't do all the experiments that you can do on that, and we still have not. I think if we did another series, we still would not have. It is a question of how much is enough to answer

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what questions you have to have answered. I think there are still some things we would like to find out, but I don't think that they weigh, as I said in my testimony on the test ban, I don't think they weigh very heavily in the overall military situation.

INTERVIEWER: Did the Weisner group go back in business at the end of this 1962 series?

BROWN: To evaluate the Soviet—yes, it did. It did. In fact, I think there is a national security action memorandum that constitutes it as a permanent committee, which has not met after that.

INTERVIEWER: Did they make a comparative evaluation?

BROWN: Yes, and that went into the test ban decision. It was one of the inputs into the instructions with which our test ban negotiators were sent over, in the summer of 1963.

INTERVIEWER: I wonder then if you could upgrade our perspective by a year now, from 1962 to 1963?

BROWN: Yes.

INTERVIEWER: I gather the Stennis [John C. Stennis] hearings began in the fall of 1962.

BROWN: Yes.

INTERVIEWER: Did you testify before them?

BROWN: Oh, yes. I was the anchor witness.

INTERVIEWER: What were they after?

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BROWN: I think several people on that committee were out to show that the nuclear test ban was dangerous, and they were not on the Foreign Relations Committee, so they didn't get a chance to do it there.

INTERVIEWER: But we were taking the comprehensive test ban treaty seriously, and were pressing quite hard?

BROWN: Yes, we were. I think that right in the middle of that, of course, the treaty was signed and it was not comprehensive, which in many ways was a good thing, because quite a lot of the negative testimony or adverse testimony was based on how bad it would be not to be able to do any nuclear testing at all because of the loss of competence in the area. Of course, you pay a penalty every time you gain something, and the penalty we pay is that it would not be correspondingly hard to get a comprehensive test ban through the Senate, since quite a lot of the testimony as finally given placed emphasis on how this was a good treaty because it allowed underground testing.

INTERVIEWER: Why did we continue to push so hard for the comprehensive treaty?

BROWN: I think that most people felt if you were to have an inhibitory effect on other countries, it would be greater if you had a comprehensive treaty. I never believed that, and I now have even more reason not to believe it, since seeing how the Chinese and the French behave. But that I think was one of the reasons.

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The other was the feeling that, well, if we were ahead in tactical, and tactical was one thing you could test very well underground, this would give them a chance to catch up. Looking back, that turns out to have been—I guess I kind of believe that one. But looking back, that turns out to have been wrong, too, because they have done very little underground testing. So whether they could or not, they have not, and either they are not interested or they don't know about it.

INTERVIEWER: Was that your view in, say, 1962 or 1963?

BROWN: That what?

INTERVIEWER: That they could catch up in tactical?

BROWN: Yes.

INTERVIEWER: Did you come around. Did you rationalize here your position?

BROWN: No, I think I always said, even in my testimony, they could catch up in tactical matters, by being able to test underground, but it would take them a little while, because first of all, they had very little experience in testing underground, and secondly, the comparison was not between what the situation is at time X and what happens if they catch up, but the comparison is between how fast do they catch up under ground and how fast do they catch up if you have testing in the atmosphere? The answer is that they catch up faster with testing in the atmosphere.

INTERVIEWER: And also I imagine there is the affirmative

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desire to get inspection.

BROWN: That was very important, but of course they were not interested in that.

INTERVIEWER: What was the Vela project doing? What was your role in it?

BROWN: Actually it went on pretty much by itself. It is an attempt to improve detection methods, both underground and in space, and it runs along parallel to the effort to evaluate how well off you are at any one time in this capability. It really did not influence the course of the negotiations much. It has proven useful in improving our detection capability. But it was really living up to a commitment to try to improve, and we have lived up to that commitment.

INTERVIEWER: Were we improving our capability by a large factor?

BROWN:

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INTERVIEWER: What was behind the preparation of the White Paper? What was it?

BROWN: That had to do with getting the test ban treaty through the Senate, if I remember correctly.

INTERVIEWER: That is the limited test ban.

BROWN: Yes.

INTERVIEWER: Do you remember what was in it?

BROWN: All of these arguments were in it.

INTERVIEWER: Is it a briefing?

BROWN: All of these arguments were in it, and actually it was an attempt, as much as anything else, to insist that the Joint Chiefs of Staff either support the treaty or give good reasons why not—that is, not allow them to give bad reasons why not. I think it succeeded pretty well. When you insist on people talking only about what they know, you can get the facts out on the table.

INTERVIEWER: Were these things fought out with the Joint Chiefs?

BROWN: There were a number of fairly rough sessions. I was not present at most of them. I think General Taylor, as much as anyone else, insisted that they say what they knew and not what they guessed.

INTERVIEWER: Did they all play ball? Were they honorable

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in the process?

BROWN: Yes, I think they all said what they thought. The document that they presented represented their genuine views, and their testimony, they reiterated what they said in that document. They also expressed some reservations and fears, some of them, but those were separate. Those were identified as reservations and fears, and not as different views.

INTERVIEWER: General Power [Thomas S. Power] was not inhibited?

BROWN: No, he was not. I think he was not very well informed, either, but he was not inhibited.

INTERVIEWER: In the process of the test ban hearings, you became a symbolic antagonist of Dr. Teller.

BROWN: Yes.

INTERVIEWER: How did this arise, and was it warranted?

BROWN: Well, he and I disagreed on this matter. That was very clear.

INTERVIEWER: Did you ever talk to him about it?

BROWN: Not before his testimony, not immediately before his testimony. I have talked to him several times over the period during which all of this was happening. I think he obviously felt that I had deserted a previously held position because of my surroundings. I did see things from a different point of view. I had different responsibilities, and I now have to make the judgment on the military effect, not just on how important an advance in nuclear weaponry is for nuclear

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weaponry.

INTERVIEWER: Were you involved directly with the President in the process of the preparation of the treaty and its ratification?

BROWN: I think I may have been in one or more meetings, but I don't really remember. I don't think—I think this was handled separately, and I don't think that he supervised the presentation. I do know that he did send me over to try to convince several senators, not very successfully, but some of them successfully.

INTERVIEWER: Who did you work on?

BROWN: Well, it was a lunch that George Smathers [George A. Smathers] gave. I forget who was there. Well, no, Senator Cooper [John Sherman Cooper] was there, and Russell Long [Russell B. Long] was there. I didn't succeed in convincing him. Stuart Symington [Stuart Symington II] was there and he changed his mind, but I am not really sure how much credit I get for it, although when he is talking to me he says I did it.

INTERVIEWER: It strikes me in retrospect that the limited test ban treaty came up very quickly, and came up without a direct involvement of the bureaucracy.

BROWN: Yes. Well, we just lucked out. I think the President made this American University speech. I don't think he really expected anything out of it. It looked as if they were willing to deal. Whether it was because of the Chinese or what is not at all clear, but I think that really

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is the way I think we are going to get disarmament agreements, if we get them. You keep pounding away...

INTERVIEWER: Bypassing the bureaucracy.

BROWN: Well, without the bureaucracy I am not sure you would get them, because they lay the groundwork and they assure that all this thought goes into it, and then some circumstance or some particular person's desire at some particular time allows you to make one more step. In a very real way I think that the Cuban Missile Crisis was partly responsible for this. Every time we get a scare, I think—and by us, I mean us and the Russians—we are less worried about immediate gain or loss in a military sense, and more worried about the desire to prevent a catastrophe. Now, whether the nuclear test ban by itself, whether it does anything to help this is not at all clear to me. It never has been right from the beginning. But as a symbol and as a first step, as all those things, I think it has been important and useful, and I still think we probably would not have had it if we had not gone ahead and tested. The Soviets would have gotten everything they wanted out of us otherwise, without an agreement.

INTERVIEWER: The President was just as reactive to events as the bureaucracy all the way through.

BROWN: Oh, yes, except that I think his own particular strong feelings about some matters underlie this as a constant upon which all his reactions are superimposed, and I

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don't think his reactions ever got overbalanced—his reactions never suddenly overbalanced his strong feelings. His reactions were reactions to immediate events, and yet they were immediate. That is, his reactions did not create a long term policy on his part.

INTERVIEWER: Do you remember any way he expressed what his basic views were, the most important views that bear on his policies all through this?

BROWN: I think on more than one occasion he talked about nuclear war and about how terrible it would be, and how impossible it was in the long run to conduct a foreign or military policy based on large scale thermonuclear war as a real tool of that policy. Now, the connection between that and the nuclear test ban is not an immediate one, but it is there, and I think it is what motivates everybody. People were for it and against it. The ones who were against the nuclear test ban by and large by and large are the people who do consider that thermonuclear war is a rational instrument of foreign policy. The people who were against it, some of them, including me, I think recognized that there may still be a thermonuclear war, and you have to configure your forces and take some of your actions recognizing that it is a possibility but that it is not a policy, and is not a way to get things done.

INTERVIEWER: What was Jerry Wiesner's role in this?

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BROWN: I think his was technical, but I think it was more. I think he was probably the only one of the President's immediate advisors who shared the President's very strong feelings along these lines. I think he and the President were the only ones who were kind of sorry when the decision was made to go ahead and do atmospheric testing.

INTERVIEWER: Was PSAC useful?

BROWN: No, they didn't really appear in this at all during this period. They did during 1961 and before. I am going to have to run.

INTERVIEWER: If I may ask you one more question, what was your role in the development of safeguards for the nuclear test ban treaty?

BROWN: Well, the Chiefs were the ones who invented those, and they are perfectly reasonable, providing that they are not made absolute. The AEC laboratories and the DOD [Department of Defense] laboratories and the Chiefs put those together. They could be, but they have not been, and I am not going to let them, be used as reasons to give people unlimited amounts of money or resources or do ridiculous things, but they are very genuine safeguards, I think, against surprise, against an enunciation, to the extent that we can carry them out, and I think we are carrying them out, keeping laboratories strong with a vigorous underground test program, preparing fully for an atmospheric test series, should one ever be required, and then detection

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and improving detection capabilities against Soviet tests. I think those principles are all very reasonable.

INTERVIEWER: How did you feel about making it explicit in in the context of this?

BROWN: I think it is unfortunate, but it was a political price that had to be paid, and in the event—I don't think they have yet proved binding or restrictive.

INTERVIEWER: Why unfortunate?

BROWN: I think it is a mistake to try to commit yourself irrevocably to things that you may later want to change. I think unfortunate because it puts the Congress, or some parts of the Congress, in the chain between

some parts of the executive branch and the top decision makers of the executive branch. I don't like that. I think the top executives, including the President, ought to be responsive to the Congress and responsible—I am sorry, responsible to the Congress, but it is not too good to have laboratory directors or generals go tell the Congress that the Secretary of Defense, or Director of Defense Research and Engineering, won't give them what they want.

INTERVIEWER: They would anyway, wouldn't they?

BROWN: This makes it much more explicit. This invited the Congress to stick their noses in our business at a stage where normally they wouldn't be. Well, it hasn't been too bad yet. I hope it doesn't get too bad.

[END OF INTERVIEW #5]

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