

Commanding General, Ohio River Division

Q: So, in January of '81 it was off to Cincinnati and the Ohio River Division, and a rather quick change from your previous assignment. What kind of preparation, transition, were you able to have in going to the Ohio River Division?

A: Well, I don't know how much anyone ever has. I think I probably had as much and as good as anybody could. First of all, the four months in Civil Works were helpful in digging into that arena and knowing things. Since I knew I was going to the Ohio River Division, of course, I listened more intently to those items wherever that was mentioned, or I could note, you know, a particular policy having to do with large dams. When involved with budget issues, I would always note where the Ohio River Division stood relative to others. Although I didn't really spend time focused on the division, I nevertheless could look for perceptions of the Ohio River Division, and I could go around and talk with Alex Shwaiko, Lew Blakey, and Bory Steinberg, and others to get their insights on what was ahead.

In addition, Tenn-Tom was a big item at the time. I'm not sure when General Heiberg made the famous testimony before the Senate committee, but I remember a roomful of people. I think it was during that time frame, but maybe when I was still in the ACE. I knew I was going to the Ohio River Division so I went to hear the testimony.

Also, because I was going to have to testify in the fourth or fifth week after I arrived in the Ohio River Division before the House committee, I flew out to the division and had an early get-acquainted briefing session, but primarily oriented toward the budget. Thus, when I arrived out there, we could immediately go into final budget preparation. I mean, the budget was all prepared; it wasn't a matter of putting the budget together but preparing me to defend the budget. At the Ohio River Division we used mock hearings to prepare; that is, the district engineers and their staffs came in and the division engineer and his staff would then be the committee hearing the testimony of the district. We would do that with our own testimony books before us with the projects that I was later going to have to be able to defend before the congressional committee. That first several-week period in the division was rather intensely devoted to the budget, and so going out there in advance one time to get a pre-brief was helpful.

Q: At that point General Griffith was gone, right?

A: He had left that summer.

Q: Did you really have any interface?

A: There was a six-month underlap. Colonel Rich Gell, the deputy, had been the acting division commander. I talked with General Griffith here in town briefly and he filled me in on some of the main people involved and his evaluation of them.

Q: Anything from the Chief of Engineers, instructions or advice? Or General Heiberg?

A: Well, I guess time erases most of this. I'm sure they had some things to say. General Heiberg, I know, was helpful. We talked a lot in just looking forward. He had been the division engineer out there. He liked the people. I'm sure he commented on them, and had a few insights that he passed on.

I guess the one I'm sure they all mentioned was the Tennessee–Tombigbee because it was a major issue that required focus because it was continually under attack. Every year the coalition of environmentalists and railroads would gather their supporting congressmen, and they would prepare to do battle in the annual budget process. Congressmen [Jamie] Whitten and [Thomas] Beville and their staffs were fighting the “pro” fight to keep it going. There was almost a siege mentality in that the votes were closer than people wanted them to be, and you just never could be sure that something wouldn't happen to tip it another way. So, they wanted to make darn sure that we were proceeding with the construction as fast as possible.

Q: Was there much interaction when you were first getting ready for your testimony, taking a project like Tenn–Tom, for example, with the South Atlantic Division, which had more of the Tenn–Tom work, I believe, than your division did? What kind of interaction did you have on that particular project?

A: Oh, considerable. First of all, the South Atlantic Division had the lead role—they were the lead division, no question about it. Major General Jim Ellis was the South Atlantic Division Engineer at that time—an old friend and West Point classmate. We had talked before my arrival in the Ohio River Division, and we got together early on to ensure we were coordinated. We met quarterly with our staffs at various places, to ensure we were all locked in and moving along. We did our independent work but we submitted all matters through the South Atlantic Division with respect to the Tenn–Tom budget and program. They really had the overall responsibility, which was right, not just because they had the major part of the project in their geographic area.

To answer your question, we stayed coordinated throughout and we were coordinated on our testimony. That particular year, 1981, we both testified before the Senate, which typically hadn't held hearings. In all the hearings, the South Atlantic Division would go first and we would follow. We'd always be locked together—General Ellis would cover the overall aspects of the Tenn–Tom plus give the update on Mobile District's part of the actual construction. Then I would follow with Nashville District's part, which was the very significant divide cut, which always had a high focus. Although there were many different aspects and parts to the project, some had to do with cutting out bends and oxbows and weren't so dramatic as cutting 175 feet through the divide—so a big budget item, big ticket item, always something to measure, something to see, and really a significant thing. You could build all kinds of parts of the waterway, but till you cut through the divide, you couldn't pass the water from the Ohio River basin to the Gulf.

The divide cut plus Bay Springs Lock and Dam, the largest lock chamber (84 feet) in the system, were rather significant components of the whole. I would follow the South Atlantic Division and report on those aspects of the waterway project.

Q: Did those have every bit as much environmental attention as any other part of the overall project? In other words, you had a significant environmental opposition component to your piece of it, as well?

A: Yes. The divide cut being so large a cut, we had 38 different disposal areas that had to be environmentally engineered. Also, the South Atlantic Division changed the location of the proposed channel in their area to avoid some historical and archaeological finds. We were very much concerned, for example, that we were bringing to the surface materials that had been at some depth. These weren't topsoil, but sands with a high mineral content, and their ability to grow things was doubtful. So, how we would position and place them was important, so we in effect very specifically designed 33 disposal areas.

These were not just ravines and depressions that we hauled to. They had to be designed, material brought in the right way and compacted the right way. We had to design for flows and we had to build retention ponds to catch the flows, so the waters flowing over these interior sandstones would have a chance to percolate and clean up before they reached the streams again. So, there was considerable environmental work through the divide cut.

Q: Would you say, then, that overall, the Tenn-Tom project maybe occupied the majority of your time in the civil works area when you were at the Ohio River Division?

A: No. I'd say that in the first year the Tenn-Tom occupied a significant part, maybe 7 or 8 percent. Compared to other projects, which might have had a quarter of a percent or something like that, it occupied 7, 8 percent of my time. We did an awful lot of work in preparation for testimony and those things. We often flew tours of the Tenn-Tom to educate various congressmen on the project. Congressmen Bevill and John Myers, as well as the Senate side, would identify members and talk them into taking a trip down to see the project. Typically, General Ellis would be in one helicopter with three or four congressmen and a staffer or two, and I would be in the second helicopter with three or four other congressmen and a staffer or two. I'd have one of his, the South Atlantic Division, people with me and he'd have one of my Ohio River Division people so we would talk about all aspects of the project.

We typically started at the northern end, the divide cut end because we could come in to the airfields at Muscle Shoals and helicopter over to the project. We would then fly the divide cut, which was very dramatic when you observed the massive cut, and then hit Bay Springs Lock and Dam, which was rising up out of the ground. Then we would fly down over the next five locks and dams immediately below Bay Springs. They were in various degrees of construction. The northernmost were just getting started, and then as we flew south they were in different stages of construction. When you got down to the last one, which was completed, we would stop there and tour the lock and have lunch. Then we would either fly back from there or continue on down to Mobile. The trip on to Mobile was flying over that part of the project that was straightening out bends and oxbows and widening and dredging—not so dramatic to look at.

We did that quite often. It might be for folks wanting to be updated or it might be people who'd come down to look at concerns. I remember Congressman [Louis] Stokes came down from Ohio. He had been most concerned that people had said we weren't really doing our job in hiring minorities. The antiproject groups had attacked the project from that standpoint. I think we had done a pretty fair job of minority emphasis and it had been a part of the project all along. As a consequence, Congressman Bevill knew that, and he invited Congressman Stokes to come down and see for himself. So, he brought him down. During that trip we broke out the facts and figures and briefed him on them. I believe that convinced him that we were on the right track and doing the very best we could in the area and doing pretty well. Thereafter, he supported the project.

On the opposing side, Congressman Bob Edgar came down from Pennsylvania. He had been a very outspoken critic of the project before that. He asked a lot of tough questions, and we gave him all straight answers, but he remained a very outspoken critic of the project after that. So, we had folks of all ilk down there, showing them the project. Typically, we would make that helicopter run so they could see the immensity of the project, and we'd also land at our area office in the divide cut where our area and resident engineers would talk about the project and where they were that day, how much was already done, and how much remained. We could then talk budget issues or percentages and that sort of thing.

South Atlantic Division had put together an intercom setup that they would bring to the helicopters because when you get different helicopters from different people you never know how many headsets you're going to get or what works. Their setup had something like eight headphones so we could give everybody a headset. Thus, we always had communications so that we could talk in the air and point out features as we flew along.

Q: Were the costs of the project one of the big issues—probably the biggest issue outside of the environmental?

A: Yes and no. The overall cost of the project was always featured when people would attack it. Years earlier, costs had been a factor in the early construction of some of the first of the dams. I know the South Atlantic Division and General LeTellier had been involved with early cost estimates. By my time frame, that was history. We had already spent about half of the project. We were certainly doing big ticket items up where we were. There was a lot left to be spent, and I think that increased the zeal of the folks against the project. They figured they really needed to get it stopped immediately. Of course, it made the point for those who wanted to continue the project too—there was an investment on the ground.

Even the environmental issues were typically used as an opportunistic way to oppose the project. I mean, the people against the project were primarily brought together by the railroads, who were trying to avoid the competition of the waterways. They led the fight and they signed up the environmentalists to aid their actions. Certainly there were valid environmental considerations, but in the end, I'm pretty proud of the way the Corps addressed the environment, did things the right way—used good engineering practices to solve environmental problems.

As a matter of fact, I later on had been asked by a professor at Miami University at Oxford, Ohio, to come up and talk to his class on environmental engineering two straight years. I used the Tenn–Tom as an example of how an engineer deals with environmental issues and construction development. You see, I could make the point that although there was a channel where there was not a channel before, certain things were seen by some as improvements—bass fishing was superb the very next year after we opened Bay Springs Lock and Dam. We protected against wash of any kind of nonnatural flow into the stream during construction. We avoided with well systems and dewatering systems, sloughing off of the banks of the 175-foot-high cut—we pulled the water table way down there. We worked hard to design against environmental injuries and for environmental improvements.

We took great care in building the disposal areas and shaping them so they would drain properly. We put topsoil on them, and lime, and other things, and we tested them. Some of the soils were very acidic from coming from the subterranean sands. It would be difficult to support any vegetation on them. We would treat the surface and put on the lime and then we'd sow grasses. Then we'd come back and monitor the systems for draining and settling particles before the water percolated back into the stream. We really took a lot of care to make the disposal areas be a positive, not negative, environmental feature. Even shortly after finishing, we would go down there and people were talking about what a great duck flyway we had built—because they now had all the ponds along the way where we left them up in the disposal areas—and how good the hunting was, and the fishing, and things like that. So, I think we really did do it in the best environmental way possible.

I think you have to remember that the main advocates against proceeding were the railroads, who put together a coalition of opposition.

Q: Did you have occasion to have direct interaction with railroad executives during your time?

A: No.

Q: Okay. I don't know if you have any other Tenn–Tom observations or comments at this point. It might come up again.

A: Well, of course, it continued throughout the period that I was division engineer. We had the opening of a dedication of Bay Springs Lock and the divide cut just before I left, so I got to be the division engineer that finished the project. I did leave a few claims for Pete Offringa to take care of later on, but the clamor during that time was to finish. Oftentimes we came to Washington to brief Hunter Spillan and Congressmen Bevill and Whitten where we were on the project. The idea was: don't let the schedule slip, deliver on time, and don't let costs increase.

We were held closely accountable for progress, not that we weren't always accountable, but maybe with some sense of skepticism on their part that we really were going to finish when we said we would. So, we picked a date and said we're going to finish by that date—if you keep getting us the money we need—and we met those time frames. That was something, then, that the congressional supporters of the project didn't have to go back and say to their

colleagues, “We need to give them so much more money”—whenever they would go back to the well for a revote, which they had to do every year. The system provided that the project could have been killed every year if the money was not appropriated to finish it. So, it had to meet the test, I don’t know, 12 or 13 different years, to be continued, to include the very last year. It seems kind of preposterous that when you have \$1.2 billion invested in a project and for the last \$100 million Congress might scuttle their big investment to date—but that was the legislative system.

So, I spent many hours going down there, inspecting construction and following up, in addition to quarterly meetings with the South Atlantic Division, just making sure the project stayed on track, then coming up to Washington and reporting the project was on track. In fact, it stayed on track and we made our schedule.

Q: Who was your district engineer in Nashville during this period?

A: Colonel Lee Tucker was the first two years. Then Colonel Terry Kirkpatrick came in my last year and was the one there at the finish.

We had some just tremendous people working there on the project. The team put together to work the Tenn–Tom was just super. Euc Moore was the Chief of Engineering in Nashville District, and Charlie Hooper was the Chief of Real Estate. The Chief of Construction was Dan Hall, and Jerry Rainer, the area engineer, had three residents underneath him, such as J. C. McDaniels, who had the divide cut. All were top drawer, salt of the earth, Corps of Engineers kind of folks that you just felt good about. You know, I’d go into the area office and turn everything over to them and they would brief the congressmen straight on. I mean, you know, every day they’re out there in their construction boots and hard hats, chasing the contractor and making sure all went well. When you’re sitting there with a massive project—you have to recognize, now, the claim that Morrison–Knudsen put in on the divide cut project was \$50 million, so it had to be a pretty big project. They didn’t get that, by the way; that was what they claimed for costs associated with unknown conditions.

We had great folks down there working on the Tenn–Tom. They were just great to be with. From the district office—the care that the Chief of Real Estate and Construction and Engineering and Planning put into the project—down to the area and resident engineers and their inspectors.

Q: What was it like taking these congressional groups on tour? Was it a fairly routine business sort of thing? It must have been something of a strain if you had a helicopter full of critics of the project—really put you on the front lines.

A: Well, it was, but—I don’t know. By this point in time I was used to doing it—I mean, having testified and being used to senior Washington people by this time. You can’t do much else but deal with them directly. When you get a question, you answer it truthfully and factually, whether it’s coming from a supporter or a critic. So, when Congressman Bob Edgar would throw tough questions out, we’d answer them straightforward. He might be throwing soft curve balls, so we’d better be answering those straightforward too. I mean, he sounded

almost like a supporter sometimes when he was down there, he was so smooth—but he got it straight from us just like the rest.

By the same token, Congressman Bevill, a supporter, would throw out tough questions, which would be making certain points to other people or really wanting to make sure we were staying abreast of the issues. The only way was dealing with it all straight. We didn't participate in getting them there or getting them home. They would usually fly in on the Chief's plane to, say, Muscle Shoals. We would have flown down from the Ohio River Division and Nashville in a chartered aircraft—the division didn't have an aircraft. I'd bring some of my staff and we would fly into the same airfield. General Ellis would fly up from Atlanta the same way and then the district engineer from Mobile would be in charge of all the logistics.

He would bring the helicopters and the headsets and everything else. We would assemble there an hour or a half an hour before the Chief's plane arrived. They'd typically be running late because they got off late from Andrews, so we'd pile them all in and we'd roar down the Tenn-Tom Waterway talking about the project. Then we'd land and visit the area office and handle all these questions very directly, then fly on down to the other office, have probably a box lunch or something like that. We'd be tossed questions, and we'd all be sitting with our area engineers and the party in a group. Then we would hustle them out to the airplane so they could fly back to Washington. It was a rapid-fire day. Then we would hop aboard our charter aircraft and fly back to Cincinnati—so it was just another day in the life of a division engineer. [Laughter]

I mean, we would prepare our notebooks, you know, so that we could flip to pages and have the right map to show whoever wanted them, with the facts at the right place, anticipating questions and that sort of thing, but most of the time we got so we could wing it because we'd done it so many times pointing out the project features.

Q: It's a lot of high visibility. It probably means that the congressmen know more of the names on the lists of generals to be promoted from the Corps than they know from any other branch, probably. They knew you personally.

A: Well, probably, but we're talking about a few handfuls of congressmen total that went down through all that. I mean, certainly Bevill and Whitten, and John Myers from Indiana, the ranking minority member, were perennials. They knew the Corps' generals from all of this, from their testimony and the other contacts.

Q: Does congressional testimony get to be routine too? Or is that different?

A: No, it never got routine. I think I got better at it, but I don't believe it ever got routine. Of course, we were dealing with a tough staff. I mean, Hunter Spillan's not the easiest person to deal with, but I think he was pretty straightforward. As long as we were dealing with him straightforward, things were all right. So, it was like anything else. I mean, you just ought to be forthright and straightforward. You really want to do your homework. You can't go in there blind.

From the first year, where I really had to take what was there for testimony, I always tried to develop really a story line and to say something, not just review projects, not just a catalog of, “Here’s what we’ve done,” but to point out what it meant in terms of the budget. I worked hard on my budget statement every year. Of course, it was printed in the record and it’s all sitting there. It was really a “Here’s what we’re doing and what we need and why” kind of a statement for the division. There was a longer written statement, and we would cut that down for the oral briefing statement for whatever minutes they gave us. We would then try to anticipate questions and answers. I would call on the various congressmen and their staffs prior to testimony to ensure I was ready. I would call on Hunter Spillan to identify issues, make the connections, and ferret out potential areas that he wanted to make sure were answered.

We could usually be prepared to address what would come up, but it was never routine. The first year, besides the Tenn–Tom, we had another most significant project because it was a controversial one—the Section 202 flood control program in West Virginia, Kentucky, and Virginia.

The event that led to that was a very large flood in April 1977 that wiped out portions of those three states and inundated the Tug Fork and the Levisa Fork valleys of West Virginia and the upper Cumberland River in Kentucky.

Five cities were named in the legislation, which was widely pushed by Senator Robert Byrd. I only mention his name—there were others—because he was the one who was most visible in our connections thereafter. That legislation mentioned Williamson and Matewan, West Virginia; Pineville and Barbourville, Kentucky; and Grundy, Virginia, as the five cities. It basically said that regardless of all weather policies and normal ways of doing things, we would provide measures to alleviate the flood conditions of the standard project flood for the area. The specific language is important because when Secretary Bill Gianelli later got involved—he was not yet there at the time—he thought the language was too *carte blanche*, and so he opposed the project. Senator Byrd had been a writer of the legislative language, along with Senator [John] Cooper from Kentucky and others. He knew what he intended it to mean, and so we in the Ohio River Division and Huntington District found ourselves in between two giants, Gianelli and Byrd, and their different interpretations of what was meant by the project. That remained a ticklish situation throughout my tenure as the division engineer.

This very first year of testimony for me also coincided with the Senate’s wanting to have testimony on the Tenn–Tom. Senator Byrd also wanted to hear about his Section 202 project. I remember it well because the hearing was held in a very small room in the Senate. We really had to crowd in. General Ellis was at the table because the South Atlantic Division always testified first on the Tenn–Tom. I was standing in the back and could hardly get through to my seat when it came time to swap. Ellis got up and I came in. Everybody was looking around, and the committee chairman looked around for the majority leader, who wasn’t there. Someone said, “He’s not coming.” So, everyone got up to leave and then all of a sudden somebody says, “Senator Byrd’s on his way,” so everybody scampered to get back in their seats. He really was very pointed and direct in his questions to me. I mean, it was

almost like a prosecutor and I was on the stand. He was nailing down where we were to make sure we were moving out and implementing that project as conceived and on a responsive timetable.

We had anticipated this, knowing his interest, and I had flown out to Williamson. I had been with Senator Byrd earlier on the R. D. Bailey Dam dedication before I had even become the division engineer. When it came time to dedicate R. D. Bailey Dam, which was in southern West Virginia, the Chief of Engineers couldn't go, General Heiberg, the Civil Works Director couldn't go, and so they asked me to represent them and fly out there with Senator Byrd and back and give the remarks. They told him that, although not yet announced officially, I was the future division engineer in the Ohio River Division, so the person he was going to be working with would be there.

Senator Byrd really wanted to pin down where we were—and the 202 project was large and not yet to the point of designing so we could start building something physically. What he really wanted to tie down, like I guess any congressman wants, was something on the ground, some visible action that things were happening. So, I was telling him at that point about when we were going to start the first increment, a pumping station, at West Williamson—as part of that project. He was interested when we were going to build the flood wall at Williamson—we're talking about a 40-foot high wall—but we were still doing the engineering on that project.

We laid out the program as we saw it. His questions really nailed us to the wall—he meant that program to proceed rapidly, and he meant for us to deliver that program as it was. So, it was a pretty strenuous 30, 35 minutes of questioning by Senator Byrd after only five weeks in the job.

Q: Some of those questions were probably actually directed at Gianelli, at the administration.

A: He wasn't there.

Q: He wasn't there?

A: I don't know that he'd even been named by February or March. I just don't remember. He didn't participate in that first year's testimony, so we didn't really know of his antipathy to the project at that point in time. I mean, this was straight-on. We read the language, we interpreted it the way we thought it was meant to be, and we testified as to how we were going to proceed. It was later on that Secretary Gianelli interpreted it differently, when the administration came up with the cost-sharing proposals that they wished to apply and Senator Byrd didn't think they should apply because of the way the language was written. Gianelli wanted to reduce the project, to be designed at standard project flood, back to a hundred years' storm.

Q: I think that level was perhaps even less than the big flood that this had all been in response to, or it was pretty close. That was one of the issues, I think, that they wanted to bring you back from standard project to something that was the original cause of all this.

A: The fact was that we had testified one way. Secretary Gianelli sought not to take on Senator Byrd directly, but sought to see if he couldn't have us change our ways. Well, we were part of the administration and, of course, had to do things in accordance with administration policy. Nevertheless, we also had responsibility to call a shot a shot. If this was a standard project flood design, it's a standard project flood. The secretary had some consternation with us because we kept sending him plans and designs and programs that he didn't want. Yet, it represented the way you solve that particular problem, given what we were given.



General Kem with Mr. William R. Gianelli, who was Assistant Secretary of the Army for Civil Works from 1981 to 1984.

Then he would get calls from Senator Byrd, "Where is it now?" He told me that he didn't understand why Senator Byrd's office was always pressuring him to give him things that he didn't even know about yet, insinuating that we were calling Senator Byrd and telling him to call. The facts were that Senator Byrd's staff was very good and he was very personally attuned to this project. In fact, they were calling us weekly, sometimes daily, asking where

something was. So, if we had just had returned to us something from the Secretary for Civil Works to redo, then we would tell him we just got it back to redo. Then if he would take umbrage to that, he'd call Secretary Gianelli's office and say, "How come you returned it?" So, he'd get an answer. Then we would send it back up, and he would know we sent it back up because he would have called and asked, "Where is it, have you sent it back up? Haven't you finished it yet?" We'd say, "No, we haven't finished it yet, we're still working on it." Then it would go up.

We could be passive from our standpoint because he was very actively engaged. Senator Byrd had a very sharp staff operation that always stayed in tune. He knew the value of staying in tune and intelligence, and so when the report would go back up they'd know it. It would stay three weeks in Civil Works, Planning, Lew Blakey's shop. Senator Byrd would know it was there so he'd be calling them, "Where is it?"

When they'd ship it over to Secretary Gianelli's shop, they would call them and ask, "What are you going to do with it? When?" So, the secretary could not escape dealing with Senator Byrd on this issue. I believe he thought he could by burying it with us, but it was not to be buried because it was so active. So, this put us right in the middle.

In this first episode that I was talking about, in the testimony in February 1981, Gianelli was not yet aboard, had not yet visited the site, and so this was a very straightforward testimony about what we planned for the project.

Of course, in the years afterwards, Senator Byrd used the figures and milestones that we had given that year to say, "You said you were going to do this by this date; where are you now?"

We took Secretary Gianelli to the Tug Fork Valley on a first visit some months later. We thought it would be straightforward; we would just show him how important this project was, why it was necessary and all of that. As we flew up the Tug Fork, his disdain for the project was apparent. We got to Davy, West Virginia, a coal mining community that was really down and out, with a lot of poverty. It was a place that then Senator Kennedy had visited during his campaign in '60 and had received a lot of TV coverage. We almost had to land vertically in the town's softball field to get in there by helicopter. We then got in a panel truck to drive around through the town. We passed over a stream. The stream was littered with car bodies, and a couple of diapers were floating down the stream. Seeing this, Secretary Gianelli said, "These people don't deserve to be helped." We knew we were facing a critic of the project right there.

Q: So, was a lot of it a question of definition on his part, do you think? That is to say, you know, what are you talking about, define it, and then what is the legitimate federal role in that? Is that more where he was coming, or how much money the federal government should spend on such things?

A: I think so. I think there was a legitimate federal role, part of it, and he was carrying the administration's banner, which was cutting back the amount of federal participation in things. Plus, there was talk of cutting budgets back and there was the money question. Those

were basic involvements of his. We tried to suggest that the legislation as passed, signed by the President and everything else, said certain of the normal things were overcome by the words of the legislation and, “Therefore, Mr. Secretary, you really need to deal with those issues with the Congress straight up—that is your role as the secretary. If you deal with those issues straight up at the top, then it’ll be clearer to us about how we proceed. If you don’t deal with them at the top and only talk to us about your misgivings—and don’t talk with the man who wrote the legislation—then we are probably going to be having a lot of stress because the legislation says we should be doing something, and we have a person holding us and you accountable for it, and so we’ve got to deal with it. So, who best to deal with that—us at the bottom or you at the top?”

He chose not to deal with it till later and tried to go by these other means and stretch it out, so that made for some touchy times in dealing with the Section 202 program.

Q: How far had that gone by the time you left in 1984? Was the project still ongoing?

A: Yes.

Q: Gianelli was still there, I think.

A: Yes.

Q: So, was it still that this guerrilla warfare hadn’t really been resolved?

A: Well, it was resolving. It was resolved shortly after I left, as I recall. Secretary Gianelli and Senator Byrd finally did come to grips with what the legislation meant. The resolution was that the most liberal interpretation would apply to the five named communities, but not for the others. That was helpful and that would have been helpful to us early on because we had to study the whole watershed areas to find other places to determine what we needed to do to protect these areas. We had community concepts all over to bring protection to this same kind of high standard. The new agreed-to resolution greatly reduced the number of communities to be protected.

The problem at Matewan was how to protect a town that had almost been completely destroyed by flood and almost didn’t exist any more. We practically had to rebuild a site for the town and then protect that site from the flood while the town was rebuilt. Now, that’s pretty important in West Virginia. See, that’s one of the social issues involved in determining what is the federal interest. What’s a social interest; how much should people do; what’s right—in that almost everything in West Virginia along the rivers is vertical and communities exist on narrow floodplains alongside the rivers in the deep valleys?

Q: In the floodplain?

A: In the floodplain—that’s right. So, what do you do? Even people living up the hollows and those who were doing the coal mining would come into their community seat for their dime store, supermarket, and movies, et cetera. For that country seat to exist, you had to protect something. So, should you have a Matewan or not? So, that’s where the gut issue was, and

certainly with Senator Byrd. In the Section 202 authorizing legislation, they had come to grips with that question and decided, “Yeah, these communities we ought to have.” Secretary Gianelli, from his viewpoint, didn’t see it that way.

Another issue in the Section 202 project was providing alternate housing. We thought we had developed a pretty creative approach for a nonstructural solution. The Corps was always being criticized, “You always only find structural solutions. Why don’t you look for nonstructural solutions to some of these flood control problems?” We found, near Williamson, one rather large draw that we thought would support a new community. Our intent was to build a housing community—I forget the number, some 65 units would fit in there. Not many, but a lot considering the size of communities we were dealing with. Then people could move to that new housing and give up areas of the floodplain. We then would remove the vacated houses and that area wouldn’t have to be protected at the high cost of floodwalls. It was a cheaper solution—a nonstructural solution. Also, not a normal solution, so we very excitedly briefed the secretary that we’d found something that we thought would hold down costs. We also had arranged for the West Virginia housing folks to take care of running it so it would not be federally maintained. We were just going to deliver the project. We thought he would find this approach desirable, and he was absolutely opposed to it.

So, in the meantime, we still had mayors calling us every week and Senator Byrd calling us concerning the project. That took place in the Kentucky part of the project, although we just never had the congressional visibility or interest there. We were progressing in Pineville and Barbourville on projects. Pineville, very specifically, had a loop in the river where the river leaves the mountains and the river flow makes a big bend away from the mountains. That was just enough space for people to build a town. Trouble was, when the floodwaters came up, they inundated everything below that mountain in the valley, to include the whole town. That was Pineville.

Finding innovative solutions for Matewan was a challenge and involved the whole town, which made it costly. This was also a program—the 202 program—that took a lot of my personal time. Maybe this one took more time than the Tenn–Tom because there was so much consternation in the secretary’s office. They were always returning stuff to be retooled and arguing against our budget projections and insisting we couldn’t do certain things.

Basically, I took the position not to compromise our ethical position. When told that something couldn’t be accomplished because we weren’t ready, then I would correct that misrepresentation.

Secretary Gianelli perhaps felt he would lose on the Section 202 affair with Senator Byrd and tried to make it not work through us by claiming we were unable to deliver. We knew we could deliver and had testified to Senator Byrd that we could deliver. The senator, in fact, believed us from the start and knew from past experience that we could deliver. So, the secretary’s working 202 the way he did was not creditable to Senator Byrd; that’s why he kept putting the pressure on the secretary.

The senator's office was smart enough to know that he couldn't just pick on us to keep us in the middle. Gianelli was putting us in the middle but Senator Byrd's office knew we didn't belong in the middle, so he would focus attention back on Gianelli. He knew to deal directly at the top, knowing that's where the deal had to be made. The secretary chose not to engage there for the longest time, until after I left.

Q: Did you have other projects during your time in the Ohio River Division that the assistant secretary's office got involved in to that degree, had that strong feelings about it, or was this really the major one for the division? How about the recreational areas closing in Pittsburgh and Louisville Districts and reduction of locking services?

A: Oh, yes, those were other raw spots.

Q: Let's see, were they tied together as issues?

A: No, they were really separate issues. They did focus on the same thing, and that was on the administration's goal to cut back federal expenditures. Secretary Gianelli was the administration's responsible man in the water resources arena, and he was trying to make it happen. The problem was in all of those things, there would be a pronouncement of the policy and then the facts would be requested. When we'd present the facts, they weren't always supportive of what had ever been in the secretary's mind when he made the policy. So, the statement might be made, "We need to close recreation areas and you can do this without any problem and save so much." Then we would be asked to go through the drill to evaluate our recreation areas, address potential savings and how we would do it. Our Corps recreation areas, for the most part, are very austere manned. A lot of times they're contracted out. A lot of times the only people we have at a dam are the people required to operate the dam for purposes of safety, and then they check, as our contracting representative, the contractor who would operate the associated recreation area.

If you only have two people at a dam and recreation site, you can't really cut them—so you don't really have a saving. The idea, then, would move on to, "Well, then contract more out." Contractors only contract places where they think they can make a buck and have a going organization. So, the good ones were already taken over and the other ones they didn't want. Then what remains of our responsibility? We have a lot of roadside pull-offs, which we didn't particularly care for either. Maintain those? A motorcycle gang could trash one in a matter of a few hours, chuck stuff out, rip stuff up, throw all the beer cans around. I mean, these were not all fun responsibilities to have, but we'd build the recreation areas of every type under some kind of program. So, do we have a responsibility or don't we? How do we get out of that responsibility?

The states said they didn't want to take them over because they didn't want to clean up after those motorcycle gangs either. So, can we just walk away from it or can't we? I'm saying this to highlight the kind of issues we faced. Once you then add up all of those things, those we think we can do, the things we think we shouldn't do because of low levels of use, and the things we know no other state or contractor wants, when the answer is not satisfactory to a secretary who has decided it is all a pretty simple matter—you just have to close down this

program or cut it in half, or whatever. The policy maker would write a policy that he thought was going to save X amount of money. The policy was tough to write in executable terms and the money never seemed to get saved.

Our problem was that by presenting the facts, we would be looked at askance with statements being made like, “You’re not supporting what I’m trying to do.” Well, we were trying to be very supportive. The problem was that that policy maker hadn’t sought out the right information in advance of his decision to get an understanding for what was achievable. After you’ve been scrubbed several times by successive administrations, what’s left to be scrubbed? So, to make wise policy he ought to do his homework and then not shoot the messenger when he brings the facts later. Homework is only effective when completed before the answer is stated. Most people learn that in school.

The other issue had to do with tow traffic on our waterways. As part of the fiscal year 1983 budget drill, the administration said they could no longer afford to operate the waterways at the same level of service without approval of cost recovery legislation—a drill to get the barge industry to agree to user charges. As stated, the position was that without user fees there were insufficient federal dollars, so we could only operate part of the system and would close down certain parts of the system.

That was the drill, and it came about as the budget was being put together in the fall of ’81 and then became part of the President’s budget submitted to Congress in January of ’82. To us in the division—the USACE Civil Works staff may have had more direct involvement in this beforehand—it came as a blast of frosty air on a warm night—a surprise, in other words. It was just a pronouncement, “We’re going to close these parts of the system.”

We had had some staff input to verify numbers and that sort of thing, but it came out as an abrupt announcement that, “We’re going to stop and close down the navigation operations on the upper Allegheny, the Monongahela, the Kanawha, the Cumberland, the Tennessee, and the Kentucky Rivers.” Basically, in the Ohio River Division they were only going to leave the main stem Ohio River locks operating.

After his announcement, the secretary asked us to prepare impacts and be prepared for congressional testimony with impacts. We really did a lot of work addressing impacts. They were sizeable—a millions of dollars hit to the economy. The decision reflected a not very real understanding of the integral nature of the waterway infrastructure and the life and economy in the Ohio Valley, for example. It’s interwoven, and the Corps’ role in operating those systems is very integral to what’s going on in all the river basins and the national economy.

For example, closing the Allegheny River system as had been announced. Above Lock 4 or 5 on the Allegheny is a power station that supplies a great amount of power to part of Pittsburgh and the area to the north of Pittsburgh. There’s not a lot of coal goes through those locks, but when you turn down that power station and you compute out how many trucks have to go across the highways to get that coal up there, it’s impractical.

Now, what the decision means is that you turn off power to a very large number of people and a large number of industries. You do the economics and you find out this has a very high dollar impact. We did the same analysis for the Monongahela River and all the others. We did our homework and we could say, “We think it’ll cost this number of jobs,” and that was the impact we submitted.

Now, the problem I had was that in the secretary’s opening testimony to Congress in February 1982 he stated that it was the Corps’ idea to do all these cuts and that he was going to require us to relook the cost and impacts. I’m sitting in the back of the room, knowing that he, Gianelli, had directed us to do that and we’d already made all those impacts and submitted them to his office. He knew they were catastrophic.

Over the following weeks, then, we had to grapple with this issue. Congressman Carrol Hubbard, from Paducah, responding to his constituents who ran a lot of towboats out of Paducah, asked Gianelli to come out to a meeting. He said he’d come. I was with him, and at the meeting he said, “Well, those Corps of Engineers, you know how they are. They try to do these kinds of things but I’m going to relook at how they answer your needs.” I’m sitting there beside him and I know full well that for six weeks he’s had the facts about the impacts of his river system closures and knows that and what to do with them.

So, in the end, those waterways weren’t cut back because the impacts were too great.

Q: Should we turn to the Green and Kentucky Rivers?

A: There were two locks at the far end of the Green River that weren’t getting much commercial use. We already had been looking to try to pull locks out of the system that didn’t have a commercial role. We had closed the Muskingum River in Ohio and given the locks to the state years before. Ohio was now unhappy because it had all these locks and they weren’t commercially viable.

It’s not always a great deal to get stuff back from the feds, the Corps because it usually represents something no longer worth having. Otherwise, we probably wouldn’t get rid of it.

The Kentucky River was an issue, and continued operation of the locks had been challenged by the Corps headquarters. We were looking at the Kentucky and had the Louisville District Engineer, Colonel Gene Eastburn, come up and brief. The first four locks carried commercial tonnage, almost all of it being sand and gravel, a small operation of 10,000 to 12,000 tons per year. Above those four, there was no commercial traffic—Locks 5 to 14. Therefore, I deduced there was no federal interest in maintaining them so we ought to close them. We began working with the district to make that happen.

During 1982 we basically closed the system by taking the operators off, leaving a skeleton crew for maintenance, to the point where if we had a tow, we would send somebody there to operate the locks. As a practical matter, that basically closed the Kentucky River system above Lock 4.

The Kentucky River locks were ancient. Some of the dams still had saplings used for reinforcement of concrete—an ancient way of construction. They were really late last century, early this century construction. They were also very small. To really be a modern waterway you'd really have to invest some bucks in the system. To do it right, we were going to have to start replacing dams and locks, so it really was not in the best interest of anyone to continue. The problem was that between Locks 8 and 9 there were some very pretty palisades. There was a scenic boat operator just above Lock 9. He would board people there and they would have a very nice sojourn down the river, lock through, see the palisades, and return. You could not enter the river between the locks because of the bank heights. The palisades were especially nice during the fall of the year. He had a small, but nice, commercial enterprise there.

Opposition to our closing the river developed, with congressional help. We persisted, and Gene Eastburn spent many nights in various meetings. I think it went on to his successor, Colonel Dwayne Lee, who was the final person to put this issue to bed. He met with governor's representatives. There were hearings and then they changed governors and the state's position reversed. Then we offered it to the state. It didn't have a federal interest, but if the state wished a commercial tourist operation there, the state could pick up the locks and operate them. Many of the arguments advanced had to do with the responsibility for water supply for local communities, and safety, and so forth. Well, we really determined that there was not a safety problem. If one of them should breach during a heavy flood, the flood itself would have already damaged all the things that the breach would do because they were not large ponds.

We welded the lock gates closed and stopped operating them. My recommendation to the Director of Civil Works was to allow the state the opportunity to take over the Kentucky River if they chose, or sell it off to commercial interests if somebody wanted to buy portions such as Lock 8 and operate it. When we thought we had the state ready to go, and they were organizing to do it, then they would change their mind. Somebody came in and said the Corps must restore it to the right levels of service. Since we hadn't spent the million dollars a year in maintenance for a couple of years, we should then spend a couple of million dollars to fix it back to the right condition before they would take it over. Anyway, that was the issue on Locks 5 through 14 of the Kentucky River. We basically closed it of our own volition.

Q: You went from the position of Deputy Director of Civil Works to the Ohio River Division in January of 1981. Could you say a little bit about how the assignment came about and your transition into the division?

A: Well, I was selected for promotion to brigadier in November 1979 while the Deputy Assistant Chief of Engineers. General Morris, the Chief, planned to leave me in the ACE until summer 1980. Over the year, it had been discussed with General Morris that I would move to be the Deputy for Civil Works in summer of 1979. General Heiberg was the Director of Civil Works, and he'd concurred.

As I moved to Civil Works, all of a sudden the new Chief—Joe Bratton—was announced and Harry Griffith was chosen to be the Director of the Defense Nuclear Agency. That left a

position in the Ohio River Division, and so General Morris chose me to move there. Those actions took place in, I guess, about the August–September time frame of 1980. Therefore, I only stayed a short time in Civil Works as the deputy director and moved in January of '81 to Cincinnati and took command.

My transition was rather steep because our testimony before the House Energy and Water Resources Committee took place about three weeks after I took command and I was faced early on with the requirement to testify before the committee in February.

Of course, I knew about it in advance, so I had flown to Cincinnati twice on brief, get-acquainted visits. We had talked a little bit about the testimony process and how they were laying it out. Testimony preparation was the intensive part of my first three weeks in the Ohio River Division.

In addition, another important thing for a new division commander is to get around to meet various congressional and other state interests that you support. Before I left Washington, I called on the ones who were pertinent to the upcoming testimony. They were Congressman Bevill, Congressman Whitten, and Congressman Myers from Indiana, who was always interested because his district was in the division area.

Because we had responsibilities for the Tenn–Tom, both Bevill and Whitten were very key and interested in those activities. In addition, I called on Senator Byrd because of his interest in the Section 202 program and all our projects in West Virginia.

Within the division, I had initial meetings with my district engineers, but I don't recall getting out very much the first three weeks because of the intensity of the testimony preparation. Basically, the testimony statement and backups had already been prepared. I had some input into the statement of that, but not so much as in the years to come where I could take charge of the process earlier.

I was basically taking what there was and becoming acquainted with it. In the Ohio River Division there were district mock hearings, which they had done for years. Each district engineer would come in to the division headquarters with staff and testify to us, the division staff and me, on their programs.

They would use slides, and we would go through our budget book with all of the things we had submitted up through USACE and on over to Hunter Spillan and the committee staff. We would go through the pages; the division staff would ask questions of the district engineer and the district staff. We would try to ask the tough questions that we anticipated we would get during the congressional hearing.

That was a very valuable process and gave me a good stem-to-stern view of everything that was going on in the Ohio River Division. Of course, there were a lot of details. There were five or six pages for each project, and so a lot of it I couldn't absorb for the long term, but I did get used to the process and how to find things in the book. I also got to meet the district

engineer and his chiefs of construction, real estate, programming, engineering, and operations and a good overview of their activities.

Each one of those sessions lasted three or four hours, and it was a good prep session for me. So, basically, my first three weeks were involved with testimony preparation.

After that testimony in early February, I was on the road quite a bit, both back in Washington making contact with other congressional interests that I needed to call on and then going around to our four districts. I would then go out with them on their projects for a firsthand understanding. Included in that was the Tennessee–Tombigbee project, which was a maximum interest kind of thing at that time, as I discussed before. Because of its particular nature, under siege from the railroads and environmental groups, under siege in the Congress with close votes and great concern with our completing the project on time, it remained a high-interest project throughout my period as division engineer.

So, early on, then, I toured Tenn–Tom for my own benefit, got to meet our folks out there, and got down and familiar with the project in its nitty-gritty detail. The Ohio River Division’s portion of the project, the northern 39 miles of the waterway, was a complex undertaking. It included the 27-mile-long cut through the divide—175 feet deep at the divide—and the Bay Springs Lock and Dam. At a lift of 84 feet, Bay Springs was the third highest lock east of the Mississippi. In the divide cut, 150 million cubic yards of material were removed to 38 disposal areas, creating a 5,000-acre wildlife management area. In addition, four highway and two railroad bridges were relocated. Over 40 prime contractors were involved with the \$270 million contract for the divide cut, the largest in the history of the Corps.

Q: How did that testimony go the first year?

A: It went pretty well. They put me toward the last so that I could watch others. Congressman Myers had always been a very active participant, and the committee yielded to those who had states within a particular division area to focus the questions. John Myers did that for us.

In the past, he had been unhappy that one of his favorite projects had never been recommended by the Louisville District or the Ohio River Division, and thereby had been very tough in his questioning of Ohio River Division Engineers. Two of the persons who were involved in the division at the time his project—making the Wabash River a navigable waterway—was not recommended were present. The district engineer of the Louisville District at the time was Jim Ellis, who now was South Atlantic Division Engineer. The division engineer at that time was General Vald Heiberg, who now was the Director of Civil Works.

So, with both of them in the room, John Myers asked a few questions. Knowing all of this background, I had gone by to meet him and introduce myself beforehand, hopefully talk to him as a fellow Hoosier. I don’t think that did me much good.

Q: It was worth a try, right?

A: It was worth a try.

Q: Was this testimony an occasion for opponents of the Tenn–Tom to get a forum, or was the committee sympathetic enough until it didn't come up so much?

A: It wasn't a debate before the committee during the testimony. Basically the committee set aside times for people to testify, and so we were scheduled—the Secretary of the Army, the Chief of Engineers, and the Director of Civil Works would lead off the series of hearings and then each of the division engineers would follow with their testimony, two or three a session, morning and afternoon.

There was no interspersing of other folks during that particular period. Later, they would hear from waterway association interests, other interests, and so there were opportunities for people to come up and talk, but it was not a debate. For us it was reporting of status on programs and projects, and then addressing issues that we knew about concerning division programs and budget.

In addition to calling on the congressmen, I had made a point of going over to meet Hunter Spillan beforehand. I got to know him and basically began an interaction with him as the staff Director for the Energy and Water Resources Committee. I asked him what kind of questions to anticipate, what did he see as issues, and that sort of thing. It was plain that stewardship on the Tenn–Tom would be an item that they would be looking at, not only in testimony but in times to come.

I think the testimony went pretty well. I didn't get too many questions, and I think we handled them all right.

Q: Getting back to your selection, was there something about the Ohio River Division and its projects, or politics, or whatever, that was part of that or not, that you know of? You mentioned that it was a vacancy and you were a person to be put in there, but maybe sometimes that is a consideration. Was it, in this case, that you know of?

A: I think that Chiefs of Engineers, when they go about making their selection of who goes where, think about people's backgrounds and experience and put them in different places based on their anticipation of the kind of work being done and experience and background of the individual. Certainly, if a person has been a district engineer in both a military and civil works kind of district, that might prepare them better for divisions that have both missions.

However, in this particular instance, the assignments had already been made for the year. Then Harry Griffith was selected for promotion to lieutenant general and to take over the Defense Nuclear Agency, so, a vacancy in the Ohio River Division existed. I thought I'd be going to a division the following summer, so I was probably next up and certainly available from the standpoint that I was on the USACE staff. I was replaced by George Robertson, then a colonel, who filled in as the deputy director for the rest of that year. I think that probably, in this case, it was an issue of availability.

Q: So, your going to the Ohio River Division also coincided with a new administration coming into office in January of 1981.

A: Yes.

Q: It seems in looking at the issues and things that would be happening over your term in the Ohio River Division, it has very much to do with some—perhaps some continuities, but also some rather new policies and initiatives of the Reagan administration. So, maybe one way to look at some of the things is to approach it first as a general thing, and then I'd like to look specifically, for example, at regulatory reform and the decline in the civil works mission, the buildup of the defense budget.

I guess one area we could look at would have to do with the area of planning in the civil area. This is an area for construction that budgets would be going down. In other areas, advances would be under way—regulatory, for example.

How would you address that, in terms of impact of policies on the division and what you had to accomplish? I know it's a rather big thing. Maybe we can get more specific.

A: Well, it's a very good question. I guess my only problem in answering it would be trying to pinpoint any kind of day or month anything happened in this time frame, but it happened slowly.

I think I mentioned when I was talking about leaving the office as Deputy Director of Civil Works that it was in the waning months of the Carter administration. Then the Reagan transition teams were active, but we didn't have one.

So, I left USACE at a point when General Heiberg and Alex Shwaiko and others involved were awaiting the newcomer.

Then we had a secretary named Bill Gianelli, in the March–April time frame. He arrived and we got to know him as he was sorting out his role in what and how the administration wanted to play, and the cards they wanted to play, through talks he gave to various associations who were all very eager to have him come talk as to the future of the civil works program—what was he planning to do—because every association wants to get the new guy up on their dais for their meetings.

Of course, he was also dialoguing with General Heiberg, the Civil Works Director, and the Chief of Engineers, General Bratton, and we started getting some feedback downstream. What I'm really saying, I guess, is that there was a long period of development of what his role was going to be. So, it was not a very abrupt apparent change that identified that this was the new wave.

It manifested itself in questions that would come out. "Why are you doing this? Why is it we're doing it this way?" So, we would provide answers, but we wouldn't get immediate feedback like, "That's going to change." That caused our antenna to be sensitive to identify the meaning of the questions and statements. It was, "Shouldn't we do it this way, my way?"

Q: Okay.

A: It was not only the regulatory mission. It had to do with some other policies for issues that we thought were pretty cut and dried. It evolved over quite a period of time—maybe two years of evolution before we really got to the point where Secretary Gianelli was saying, “This is the way it’s going to be.”

So, we had a lot of things that we’d send up and would get back with a statement, “No, that’s not quite right,” but the guidance back wasn’t really specific on what was right or what was wrong.

We didn’t have many regulatory problems in the Ohio River Division. We weren’t big in that business. We had, navigationwise, a rather well-defined river. In the 404 program we didn’t have a lot of things going on. We were basically tracking along with other’s experiences and keeping abreast of the dialogues.

We did have a lot of navigation, and we started having that dialogue because we were very involved with the navigation associations—the Ohio River Improvement Association, initially, then DINAMO [Development of Inland Navigation in America’s Ohio Valley] started out in this era. User fees were already an issue, largely put aside. The waterway folks were, of course, very interested that the new administration stay with them, since they all felt they were good businessmen and Republican administration kind of folks. They were more than a little dismayed later on when their administration pushed for cost recovery and waterway user fees.

We were watching that dialogue. This then became the “creative financing” initiative. Cost-sharing came out of that period, but again, down the line. Early it was mostly the question, “Shouldn’t so and so pay for this?” My answer, when I was asked that question, was, “Well, we’re doing it the way the laws call for. This would be a change in policy, so I guess I’m not the person to ask that question.”

I think it was during all of those times when the secretary would be traveling around and have those kinds of conversations with many different people that I suppose it jelled in his own mind. I think it was jelled to begin with on direction, but specifics and how to write the policies and all of the implementing kinds of things took a long time to come out. So, it was a long period where things were indirect and, even in the field, rather confusing if you were concerned about really getting things done.

Now we in the Ohio River Division started to see, in particular, our own instances of that change in a couple of areas. One was the Section 202 flood control project, which I talked about already.

Another area was up in the Muskingum area of Ohio where there were several dams constructed for flood control. A lot of them were dry reservoirs, and there were encroachments into the reservoir and the backwater areas by developers who built houses. We had gone to court trying to evict people because we felt we couldn’t tolerate a house in

the flood pool because, should it disintegrate and pass on downstream, it would then threaten the system.

They were very clear encroachments. We submitted a plan of how we'd take care of eliminating them, and the local developers went straight to the secretary, who intervened and started challenging us on why we were doing it. We made the typical arguments of upstream versus downstream interests. We had a federal project that is designed to prevent certain flooding levels downstream. If we can't use the pool designed for it, how can we deliver the lower levels downstream to avoid the flooding?

It was the perennial argument of whose interests come first, downstream or upstream? In our view, this had been decided when Congress approved a federal project and we spent federal taxpayer money to build the project. The encroachers were not letting us use the full value of the project, and so to us it was pretty clear. To the secretary, it was not so clear.

Over some time period, the issue went back and forth. There was a lot of interaction in order to come up with an acceptable policy position.

At this time, we were beginning to feel that we were in a bit of quagmire of—I won't say indecision—but of a process that was not very precise. On day one you put out an order. Then things changed, certainly, but how they changed evolved slowly, over time. We worked that over an eight-month period—visits to Washington, visits to Ohio, back and forth, this actor and that actor, different interpretations as it evolved. The division staff, most particularly, was comfortable interpreting things cleanly according to a set of statutes and regulations—rather precisely. In a changing policy period, they were unsettled and had difficulty in knowing how to work things.

In the end, Gianelli more or less gave the issue to his new deputy who had come aboard. Bob Dawson and I spent a lot of days on the telephone dialoguing the wordings and meanings of sentences. "Would this be acceptable, or not acceptable, and why?" We negotiated a position in the middle, something certainly less than what we were asking, but it didn't quite give away the farm. We felt we could live with it based on the small probabilities that certain events would happen. Maybe the absolute condition we were seeking didn't need to be.

So, in answer to your question about how did things happen with the change in administration, I'd say they evolved rather slowly. The people who probably had an understanding of the compass direction in which they wanted to go nevertheless were faced with the reality of dealing with real situations, real policies, real reaction from interest groups, real reactions from Congress. They learned—in a couple of instances probably painfully—that you just don't put out an edict and it happens. You have to work it out over time.

Then we were the ones trying to execute, and we were the ones that had fed the realities to them when they'd asked the questions. Sometimes they asked the right questions early enough; sometimes they didn't. Because they weren't always free in identifying where they

were going, it was difficult sometimes to anticipate what they really wanted to know. So, it was a long, evolving process.

Q: I'm interested in that particular case with the encroachment. What was Gianelli's position on that? I mean, it sounds like a clear violation of federal property.

A: Well, it was never precisely stated, other than we were being too strict, and we were demanding too much, and we weren't realistic. It stayed the same way, and we found out we weren't getting anywhere. Bob Dawson came aboard, and he was a little more reasonable in at least having a dialogue, so we could try to work a solution.

So, I'm not quite sure what Gianelli's position was other than it should be less than what we were trying to execute. He never did state his bottom line. It was just his approach to unravel it from where it was to an easier position.

Q: This was recreational use, or were they residents?

A: They were residents. There were houses on a street in the authorized flood pool.

Q: Wow.

A: There was also a trailer park and some barns. So, it was difficult; people did have money invested. I mean, like most of the problems we dealt with, they were real, live problems because real, live people had investments.

It might have been a nickel compared to the budget of the United States, but it might have been their life savings. So, when you put real flesh and issues together, then they have to be looked at that way.

Q: Just while you were getting these visits and these questions, other divisions were getting similar visits and similar questions.

A: Yes.

Q: So, at the headquarters level, then, for the whole Corps—I'm trying to tie this together—how was that being handled? Or was it?

A: You'd have to ask General Heiberg that because he and Alex Shwaiko, Lew Blakey, and Bory Steinberg were the ones who were involved at the headquarters. My feeling was that Gianelli also didn't start off by seeking any kind of a working understanding with Congressmen Whitten or Bevill and his committee. As a consequence, he portrayed that since he was the administration, he could establish certain policies, and that's the way it would be. Of course, that's not the way it is in our government. There was some abruptness in the interactions between the two, and you could get caught in the crossfire if you weren't judicious. By judicious, I mean when somebody spoke to you about something, you had to recognize that this was part of an issue, and we all, of course, were part of the administration. Policies were policies and established procedures.

We were typically responding to the congressional side, “This is the new policy of the administration and we follow it.” It was pretty obvious that they needed to deal with the person in the administration who knew something about the policy formulation, that being Secretary Gianelli.

Later on—as I explained when I talked about Section 202 before—that project became distasteful to Secretary Gianelli, and he felt he was being put under too much pressure by the Congress, in this case Senator Byrd. He felt we ought to have deflated Senator Byrd’s expectations and taken the pressure off of him.

Well, that was a rather unrealistic expectation of the secretary. Senator Byrd certainly knew that he couldn’t drill us to change administration policy, so, being a very astute senator, he was going right to the point of influence. He wasn’t even putting pressure on the Director of Civil Works or the Chief of Engineers because he knew the place he had to go was the place where the policy was made, that being Assistant Secretary Gianelli. So, the secretary got a lot of phone calls from Senator Byrd.

Q: Well, it’s really a case of a new administration that is pretty confrontational with Congress, or at least the House of Representatives, but also a new assistant secretary who is a little more assertive than some other assistant secretaries had been, I think too. It was a period of adjustment in lots of dimensions there. A lot of that, I guess, had impact at headquarters, but it obviously had impact in the field as well, on particular projects.

A: I guess we always felt that Secretary Gianelli never had a feel for a very large organization or for the people part of it. He was an engineer with a lot of activity in water resources. The fact was that large organizations move slowly, not always by edict but by consensus and by passing ideas down and by bringing people aboard and that sort of thing. Valuing people and their views seemed to escape him.

So, it got to where he was saying things about the Corps in a negative sense, and he would say things about Corps people in a negative sense, and they heard about it and didn’t like it. They were proud of what they were doing.

He somehow put all these things in his manner in the sense of, “These folks are disloyal because I’m not getting what I want (by edict),” even though he had this problem with the Congress. The Corps was still following the law and regulation as existing. He wasn’t changing them, the laws or regulations. He was just talking, but he was talking about, and against, the Corps and still had to achieve what he had to achieve: that was the political reckoning, the changing of policies at the top.

I think the people in the Corps felt ill-served by him, that he owed some loyalty downward as well as upward. He was always speaking of loyalty, but it was always in the negative sense. He asked me once specifically, “Why aren’t you loyal to me?” It had to do with the Section 202 project. He was always speaking of loyalty in the sense that we weren’t giving it to him. By the same token, though, he was besmirching and smacking down the people that he was expecting loyalty from as he expressed it to other people.

Q: Well, one of the ways you felt the impact at the Ohio River Division and throughout the Corps was budget cutting and personnel cuts during the early years of the Reagan administration. The size of the work force was cut back. According to the division history, there were 301 O&M cuts in personnel by the end of 1982 and 157 the two years following in engineering and support services areas.

A: Oh, really.

Q: Of course, divisionwide, that includes all the districts, I guess, which led you to speak out about the problem or the need for retaining in-house capabilities for design as you were getting more and more contracting. What was that doing to your ability?

A: Those were focused—and this is by the end of '82 already?

Q: Well, with O&M, in the O&M area. That's what it says.

A: Again, it's how difficult it is to put what into what time frame as to when events happened. One of the things that happened—there are several—was the Grace Commission. The administration set the Grace Commission up to go investigate how things could be done better throughout government. Then there were our own initiatives started down through the secretary's office, and they sort of all blend together.

One of the things that we addressed was the notion that we needed to cut down the number of folks in our recreation and parks area. By the time that surfaced, there also surfaced the administration's feeling that there ought to be user fees, in some way, for the towing industry to pay for navigation improvements. The administration's tactic was to put pressure on the bottom end by just stating, "We're just not going to do all the things we used to do." So, they cut funding in the O&M arena and in the recreation and parks arena.

These were programs where we had to submit ways we would cut back. There was always the notion, common in the administration, that we should contract everything out instead of doing it in-house. We had an ongoing dialogue as to how we could best do that, and we approached all of those things from the standpoint of, with the new direction, how can we do it?

The problem was that we always came up, rather abruptly, against numbers. The Corps is not a big, overstaffed organization. When it comes to navigation, repairing locks and dams, there aren't people out there that you just contract to come in and repair a lock. You can order a new miter gate—there are some people who'll be happy to make you one over the next five or six months.

However, the people who had the big barge derricks, the heavy-duty kind that could lift heavy gates, was us—the Corps of Engineers. When a tow rams a gate, it is a time-sensitive repair, and they were all different. You go out and dewater the lock. The Chief of Operations gets down there and does a quick triage and really figures out what is needed to be done. Then they manufacture and cut the steel, or bring another gate in, or do what's necessary. Meanwhile, there is great pressure from the towing industry because we're talking hundreds

of thousands of dollars a day for every delay when they can't get through a lock and the system shuts down.

We went through all kinds of numbers drills. "You need four crews, one for each district. Can't you get by with just one in the whole Ohio? What's the right answer? Can't you cut them down? Justify each and every last person."

Once we had gone through that drill, we started to come to the conclusion that we were about where we needed to be. We could cut a few people out of the grass-cutting crew and let that be contracted out—if there were grass-cutting crews.

With the parks and recreation mission, our rangers, it was a little different. It varied by state. Some states, like Indiana, the state's Department of Natural Resources ran all of our areas and we didn't have rangers there doing the recreation part. In other places, like Ohio or down in Tennessee, we would have them and we would staff all aspects of the mission.

So, when you want to cut in a place like Indiana's Brookfield Lake, we would only have two or three people on site who really were there to operate the flood control project and had nothing to do with the multirecreational facilities at the lake. The state took care of that. When you only have three people there for a round-the-clock operation, then how do you cut? All areas got lumped together and seemed to be a lucrative opportunity. With two or three per site, how do you cut?

We developed a list of things we could cut, and we tried to close places. Of course, for every closure we ran into the realities. There would be a public reaction through local and congressional interests about not cutting back, which would come swinging around the loop. Our expression would be, "The recreation area is not well-used. We need to cut the budget, and we can't afford to run them all. We're going to operate the ones that are most effective and serve the most people."

Out of that kind of process came the cut in the operations personnel that you mentioned. We did get quite a number of cuts and parceled them around as best we could.

My concern about cutting into our professional capability came later. It was always difficult to say who was cutting what. We knew the Office of Management and Budget passed cut numbers down to USACE, and there the Director of Civil Works really figured out, based on workload levels, what the allocation should be to different organizations.

Q: Right.

A: So, a lot of our debate was with Bory Steinberg, who ran civil works programs at the time—how they analyzed our work versus somebody else's. Our thoughts were that certain things were not being computed correctly. So, it was hard for me to determine if all of those might be administration driven, except for the ongoing drills to reduce navigation and recreation.

Of course, Bory Steinberg's answer was, "I get the numbers from the Office of Management and Budget, so I have to pass the shortages and cuts somewhere." My response to them was,

“Then we’d better address the fact that we can’t salami slice away because I have to keep those three people at that Brookfield Lake because I have a flood control project there. I can’t walk away from a dam that’s preventing floods, and I’ve got lots of these flood control dams in the Ohio River Division.” When we had my people out at 76 lakes, two to three each, we didn’t have any flexibility.

So, the next thing we would have to cut was an engineer or a planner. We didn’t have many of those, either. Now you’re cutting into the capability to do the Tenn–Tom, to engineer and construct the other projects and the other missions, and that’s the heart of what we were to do. As much as I’d like to turn some operational stuff over, I couldn’t until someone eliminated the mandate that we operate that mission.

That was the reason for my comment. I was trying to build a backfire to carve out what our responsibilities were. My feeling was that oftentimes the easy way for Gianelli was to cut a number and make us sort it out as to where they fell. His feeling was that if he couldn’t get it implemented through his initiatives, he would implement it through cuts because we wouldn’t have enough people to get the missions accomplished.

My response, as I said, was, “Well, you may think we’re going to be closing park areas and stop navigation, but you can’t have a catastrophic failure on the Ohio River or a flood control dam. As long as we’ve got those responsibilities, we have to maintain them. What’s going to hurt is our capability to do the other things we need to do.”

Q: Now, I think, by the year after you left the division, 40 percent of the civil works engineering was being done on contract, according to the statistic that’s provided here.

A: When I was there it was about 25 percent.

Q: It doesn’t say, but it had grown to that, and 90 percent in military construction.

A: Military was always about 90, but civil works was basically down at 20 to 25 percent. That’s what it had been when I was there. I didn’t think that was necessarily bad. I mean, I thought we could pass some more of the civil engineering out. In military construction, I didn’t see that as necessarily bad. The problem was, and is, even to supervise engineering contracts you have to—with the professional integrity of the Corps in doing the job right on the line—have a professional force. I mean, the concept of a one-up review of engineering is essential. One has to have capability to do a one-up review. We did have the expertise in locks and dams design. Who else has designed those over time?

Different parts of the Corps had expertise in certain things. Nashville District had helped St. Louis District out on design of Lock and Dam 26. Civil works at that time went to a center of expertise approach and directed that, for certain type projects, there ought to be a district that would have the expertise and engineering capability to assist others.

For example, if you’re not building much hydropower across the Corps, then you can’t afford to have every district with a hydropower capability, so maybe the biggie in hydropower, North Pacific Division, ought to be that center of expertise. We had hydropower experience

down in Nashville, and they always thought they were a center of expertise. In this case, they couldn't hold a candle in numbers of hydropower facilities to North Pacific Division—nor could Little Rock.

Come navigation, however, the Ohio River Division was the largest builder of systems with locks in them. The division had 20 locks and dams on the Ohio River and 41 on its tributaries.

Q: Yes.

A: The Mississippi Valley Division, of course, had the open river expertise, but the Ohio River Division had certainly built many more locks and dams of different varieties than they had.

When we got into the environmental mission, centers of expertise became a big thing because we couldn't afford to put everyone into business. So, in Superfund the Corps started with designated centers of expertise.

Another center of expertise that had begun five years before was for medical facilities construction because of the longstanding problem of rapidly changing technology during the time of design and construction. Design would be for a certain set of cabinets or items of equipment, and by the time you were ready during construction to order the machine, technology had leaped ahead a couple of years and the Medical Corps no longer wanted the designed one. They had a new one. It would come with right-hand this instead of left-hand that and different size so there had to be modifications to fit it into construction. Having someone who was really up on medical facility design as a center of expertise was important.

Q: Now, when you talk about the discussions with Civil Works' Program Division about how to allocate cuts, then you, in turn, were having the same discussions with your districts, right, who were waiting from you their particular required allocations.

A: Yes.

Q: That's what led you to do some of these things that you're talking about, I think.

A: It was on the division level; we called the shots on that. Basically, what we would do was our Chief of Programs, Lou Listerman, would put together the "program" from the districts, working with their chiefs of programs. This included desired levels of staffing and funding for levels of activity in the various mission areas and projects. Then the division would send that forward, and we would have to justify it to Headquarters, USACE. Then cuts would come, or other levels would be anticipated, or we would get an allocation that would say, "This is all you're going to get." We would then go through the drills and analysis at division headquarters, send it down to the district, get their viewpoint back of what this meant in terms of impact, put those pieces together, and then dialogue back with USACE's Chief of Programs in Civil Works.

Q: One area that you tried to set up a design center in but weren't successful was in the Superfund area. I wondered if you could talk a little bit about that. It was Huntington and Nashville that you wanted. This was something you were leading, right?

A: Yes.

Q: Okay. The division didn't get it.

A: Military construction was another mission that came in. Chronologically, the military mission came before the environmental, but we can talk environmental first.

Q: All right.

A: When Superfund came about, the Corps approached it with great eagerness, like we do everything, and it appeared that we were going to have a rather good program. The newspapers and magazines at the time were covering quite a bit of the hazardous waste problem in the United States, the river in Cleveland that burned and others of a sensational nature.

A national top 10 list was created. One of the sites on the top 10 list was Chemdyne in Hamilton, Ohio, just north of Cincinnati. So, when the Chief put the Corps forward in getting involved, we offered, or were offered, to EPA [Environmental Protection Agency] for our abilities as executors.

In the Ohio River Division we saw it as an opportunity too. Because of our location, with Chemdyne, we would, without a doubt, have an early start on things, and so therefore should develop an expertise and capability to do it. It was also apparent that not every division and district was going to be able to do it.

The Chief started off in the beginning by saying, "I don't know how it will be working out, but we will want to establish expertise centers. We're not sure how we're going to manage this, but we might have one, two, five, some number of centers, depending on what develops."

So, we in the division jumped, and I think Missouri River had a very early start. We did Chemdyne using Huntington District. We went to school, sent some people off to be trained, and used the Missouri River Division to help us. We did most of the design work, and then they reviewed it, so we weren't sure what kind of help they were providing.

Out of that, though, when the call came that, "We're thinking about two centers. Who'd like to be one?" we submitted our proposal to be a center.

Dick Armstrong was Chief of Engineering and Jack Kiper was Chief of Construction. Jimmy Bates arrived to be Chief of Planning. We felt we were really in a good position from the standpoint of being central, within shooting distance of many of the nation's problems, considering our area included Pittsburgh, Cleveland, near Chicago, over to St. Louis, and down to Tennessee.

When we looked at the next list of 100 problem sites, there were quite a number of them in our general area. We thought, locationwise, that we would be pretty logical folks to be a center. So, we put in our pitch for the mission.

At the same time, EPA was really not pushing a very aggressive program. My own view was that the administration at the time wanted to talk a good game but move out methodically. They weren't in the business of rapidly addressing all of these problems, but in the business of not having large budgets and being able to methodically move after them at a slower pace.

The Corps, being a can-do outfit, presented EPA a problem. We were ready to go; we could execute. It became very apparent that they didn't want us to execute as fast as we were executing. It was almost like you'd go to a meeting and they'd say, "You're here ready to go already?" Of course we asked, "Where's your next two projects? Next time, we don't need to handle them one at a time. Give us three or four. We can clean this up."

We did Chemdyne almost without a hitch, to include bringing people in and handling the public participation. We told people what was happening and did all the newspaper work. We did all the right testing and did it all through contracts. We built a platform overlooking the fence so people could come and watch, take out their binoculars and look into the area with signs that told what was happening and the procedures. I think we did a pretty fair job of the whole site cleanup in rather rapid fashion.

I think the Corps—looking at it from the USACE perspective—could have established more centers, but there wasn't immediate work out there for centers to do. What had been anticipated as work for two, three, or four centers really was work for one center. Working through the districts involved in each place could very easily take care of the mission for the first couple of years.

That's why we didn't get to be a center. The Corp's great enthusiasm for cleaning up the country's hazardous waste depended upon an EPA program developing to provide us the work. We weren't in charge of the program; we were only providing a service to a customer, that being EPA.

Q: The Missouri River Division in Omaha?

A: The division in Omaha became the Corps' center for environmental cleanup. They had been asked to start certain things to begin with, and so they always were a lead. We were always seeking to be the second. We knew we never could displace the North Central Division. We were seeking to be the second division and the logical second one to add. Let the Missouri River Division concentrate westward, and we'd concentrate on the east coast. We thought that would be an ideal thing. The level of activity didn't develop.

Q: Of course, the division did carry out construction management for several toxic waste sites and continued the program.

A: Yes.

Q: It was just not at the level that the Corps was ready to undertake.

A: Right.

Q: I had listed—back in the regulatory area—some specific changes maybe that happened in the division. For example, a section in the division organization, like a section devoted to regulatory that hadn't been there before. I don't know if that's really worth exploring.

A: You say we did that?

Q: Yes, the history says you did it.

A: Did it, really?

Q: Well, it talked about things such as using project managers for permits, speeding up the permit process, and maybe these are not necessarily things that were going on divisionwide or at the division level.

A: I'm thinking of the division level perhaps. The divisions are lean affairs.

Q: Well, you did mention specifically a section at the division office for regulatory.

A: Divisions are very lean affairs. There was a Construction–Operations Division, probably of 15 to 19 people. We had a navigation section that might have had two people. We had a regulatory section that might have had two people in it. The recreation section might have had just one person in it. It was very difficult to look at sections as being much different than responsible action officers. This was because of our role at the division level. I mean, the doers were in the districts. Down at the district level, certainly there were regulatory sections. The way permits were handled was to assign a project manager to one because it did move over sometimes a lengthy time frame.

Q: The administration was trying to speed up the permits process? I mean, that was another administration initiative. How far did that get during your period there?

A: The question was, "How come it takes so long?"

Q: Right.

A: That was a good question, but it was put in a punitive style that didn't seek to differentiate between the norm and the complex. We hadn't bothered to break out the statistics at the headquarters between the norm and the complex. Sometimes things were complex because people objected to them, whether they had reasonable reasons to object or not. When a district was leanly staffed, they couldn't always have a meeting each and every night to wrap it up quickly. So, things stand in a queue for action sometimes.

We tracked permits, as I recall, on a 30-, 60-, 90-day basis, and worked on them. My recollection was that we weren't too bad in the Ohio River Division. Not the worst, not the

best in terms of processing time, but closer to the shorter time frames than the longer, although we had two or three or four that hung out there, too, because they were complex and involved a lot of different things.

Q: Maybe before we move into military construction, another point that was made was that you had an opportunity to make several personnel selections, that maybe every division engineer doesn't necessarily get to do. One of them—you mentioned Listerman a little while ago—was the deputy, I guess, and then became the Chief of Programming. Also Jimmy Bates came in as Chief of Planning. Do you have any observations on that opportunity that you had and how you approached it?

A: It was an opportunity to really mold a team, and I think that's the way I approached it too. When I arrived, we had a single SES [Senior Executive Service]—Dick Armstrong, a very strong-willed, very capable, talented individual. He was certainly the dominant voice on the staff, so much so that some staffers just fell into the background, so I often got just a single voice. Dave Click was a stalwart executive assistant who always provided good counsel and was most effective.

It was my feeling that, with our great operational responsibilities, with all those locks and dams on the Ohio navigation system and those 76 flood control dams on the tributaries, and with the large number of park visitors annually—I think we were second or third in the Corps—that we had very large operational responsibilities and the Ohio River Division ought to have another SES position. From that I was able to argue for, justify, and get approved that the Chief of Operations Division would be an SES position. Then Jack Kiper moved up to be the SES in that position, providing additional clout to operations.

Planning had been split off in previous years by General Heiberg, and we were doing that throughout the Corps. When my Chief of Planning retired in the fourth or fifth month after I arrived, there was an opportunity to go for another SES, which is quite a long and deliberative process. There were quite a number of very qualified candidates, and from them I selected Jimmy Bates, who had been in the division before in Nashville District.

Also, then, as mentioned, the Chief of Programs retired, and Lou Listerman as deputy had a good handle on programs, so I selected him. The Chief of Real Estate when I was there, Dave Gray, became the Chief of Real Estate for the Corps. I was very happy to nominate him and support him to the Chief. I then had an opportunity to select a new Chief of Real Estate and Dave Perkins as Chief of Procurement.

I also selected a new Chief of Public Affairs, Bob Hume, during that time frame. So, I did have quite an opportunity to put people in and build the organization.

Q: Armstrong and Bates are now in the headquarters, and the public affairs officer is still there.

A: Right.

Q: Joe Higgs is now at the Ohio River Division in the planning and engineering slot, I guess.

A: Yes. The positions were combined back together, and he's come back.

Q: Whom you knew from Europe?

A: That's right, we knew each other in Europe.

Q: Before we leave civil works, what about Yatesville Lake?

A: Yatesville was a very interesting story, and I think a compliment to how the Corps can make things happen.

Carl Perkins was the congressman from eastern Kentucky and was the sponsor for Yatesville Lake. He already had five Corps lakes in his district. I say that just because a lot of people brought that up from time to time.

There were environmental problems with building Yatesville Lake. When General Heiberg was division engineer, he didn't particularly want to proceed with Yatesville Lake. He'd come to the determination that it was not a good project, that we should not proceed, that it was environmentally damaging and we shouldn't do it.

When I arrived, I found myself faced with a lot of pressure from Congressman Perkins to get started on building 18-mile-long Yatesville Lake. At the same time, there were the questions on the environment. Huntington District came in one day and said, "We have a major problem. We've tested the waters of the river, and it has an extremely high brine content because the Martha Oil Field is located just above it."

Ashland Oil was operating this oil field, and they had a low-level extraction procedure going on. Long ago the wells were basically finished, and now they were pumping brine into the wells to force out oil. They were reaping very little, like a barrel a week, from some of them.

They were running that brine straight down the hillside into the streams, heading towards the creek that became the river that was going to become the lake behind Yatesville Dam. Huntington District said, "We're going to have Dead Sea II here if we build this lake. It will be too briny; it will not support fishing or anything else."

When that had been passed to Congressman Perkins, he said, "It's all false. Best bass fishing in the world is right there where those two tributaries come together and where we were going to build that dam. I catch bass there all the time. Best bass fishing in the world."

When you reviewed the brine content of samples measured by Huntington District, you knew that we had two views of the world here. [Laughter]

Meanwhile, trying to determine how we could proceed, we had to do the right thing, which means we couldn't build a dam that's going to be Dead Sea II. At the same time there were the pressures to get on with the congressionally approved project. The question was, "How do we work this thing and do the right thing?"

I asked for further analysis to be done on where the flows were coming from. Meanwhile, I'd gone down to the Martha Oil Field and walked it, and I was appalled—absolutely appalled—to see what Ashland Oil was dumping down those hillsides. I mean, you'd go up there and you'd see this eroded ditch coming out of a wellhead, running down the hill toward a stream, and it would be brown-orange colored from the stuff that had come out of there over time. It was just running raw down the hillside—an absolute disregard for the environment. I was really appalled.

When I analyzed how I was going to get a project like this done—no matter how much Congressman Perkins wanted it or the legislation authorized it—the fact is that you have to go through a process that ensures the environmental impacts are acceptable. If it's wrong, impacts are unacceptable, then you shouldn't do it. We had the environmental impact process with EPA, Fish and Wildlife, and everyone else participating.

We made contact with the EPA regional office in Atlanta and started talking to them about all these problems. We found out that the commonwealth's laws weren't sufficient to prohibit Ashland Oil from their harmful actions, and they didn't follow the EPA federal mandates—they had not adopted those as standards. Thus, statutes wouldn't provide us any way to solve the problem with Ashland Oil, and we'd never get through the environmental process to be able to do the project.

Meanwhile, as mentioned, we had Huntington District doing further studies as to how the stuff got to the Big Sandy River and to the potential lake and what would happen. What we discovered was that there were two components, surface runoff and ground water. We also found a fault area through there, so we traced that.

What we found was that the way the fault lay, the subsurface water, the ground water, would be cut off before it got to the lake area and would go elsewhere. Where the aquifers came in, they met up against an impervious wall area, and they were diverted elsewhere. An important find—the briny ground water was cut off from going into the lake project area.

That was very important because it takes something like 60 or 70 years for ground water contamination to clean up naturally. Surface runoff can be stopped, and it's an almost immediate cleanup.

So, once we found that we had cut off the ground water, then we felt we could come up with a solution preventing the lake from being a Dead Sea. Ground water was taken care of; all we had now to do was take care of the surface runoff from the Martha Oil Field. To take care of the surface runoff, we needed to have the Commonwealth of Kentucky adopt laws that would prohibit Ashland Oil from its irresponsible discharge of brine into the streams.

So, with this, we developed a scheme that said we would design the lake, and we would isolate the lake from the Martha Oil Field by closing down discharges and the brine source. Huntington District had come back with a proposal that we buy out the Martha Oil Field from Ashland for \$50 million. I thought that was not a worthwhile expenditure of federal funds. We really ought to get Ashland to do what the nation had mandated, and that was to

clean up the environment. We needed to get the Commonwealth of Kentucky to act. Being good responsible citizens, they would obviously want to do that same thing.

So, Huntington District approached the governor's office and found that there was not great interest at the moment in cleaning it up. Consequently, we went into a briefing one day for Congressman Perkins. I was going to lay out for him how we were going to proceed because he was badgering Chairman Bevill to get money for the project in that year's budget to get started. We did have components of the project that we could start—the tunnel for carrying the waters through the dam and the intake tower. We could start that component, but we wouldn't want to start it unless we knew we could finish the rest of the project. In our meetings with EPA, we felt that we could go into the environmental impact process and demonstrate that if Kentucky cleaned up their law so Ashland Oil would stop contaminating, we could move it through EPA and Fish and Wildlife and show we were doing a good thing for the environment. We were going to come up with the right kind of lake.

That process was what we took to Congressman Perkins. "We can get started, but we need your assistance with your state government to clean up the laws."

Basically, he threw us out of the office at that point. He told General John Wall, the Director of Civil Works, who was with us, that he wanted some of those combat generals, not all these environmental generals to talk to him. [Laughter]

Someone who'd go out there and build it, not sit there and talk about how to fix it environmentally.

Anyway, he basically threw us out of the office because he didn't want to hear about going to the state to force Ashland Oil into compliance. All he wanted to do was build the dam and lake. So, we left his office and went back and told Hunter Spillan the outcome of the conversation. We were getting close to budget time, so they put some words in the budget that told us to proceed.

Meanwhile, we knew we had to do the right thing by the environment, and so we began to work with EPA and go through the process, keeping at it, and working against the state, telling them they really ought to clean up their act. We got EPA to tell them the same.

Sure enough, a few years after I left the division, the commonwealth passed new laws that effectively closed down Ashland Oil's ability to use that antiquated method of brine extraction and dumping stuff irresponsibly down hillsides. So, the surface runoff was now taken care of. Thereby Yatesville Dam was built, we didn't spend \$50 million to buy out the oil field, and we got some good state laws that helped the environment.

The day I left the Ohio River Division and crossed over the Ohio border into West Virginia, I heard on the radio that Congressman Perkins had died of a heart attack, so he never came to see it finished. That's the story of Yatesville.

Q: Is there fishing for bass?

A: I was there a year and a half ago, and they had not yet raised the pool. I guess it's raised now. Anyway, it's a good story of how good things do turn out, and with a good outcome for the environment. There was the lucky happenstance of the fault cutting off the groundwater, or we'd never been able to proceed. Second, though, we stuck to our guns that we could do it, but if we're going to do it, it had to be done environmentally correctly. Then we figured out the ways, no longer a technical solution—we had the technical design all done—but figuring out the ways through the political process to get the laws fixed so we took care of the environment.

Q: I mean, it sounds like you had support for this position from headquarters and from the assistant secretary's office. Is that the case?

A: We brought it up to Washington and we briefed General Heiberg. I think he was basically skeptical from his own experience in the Ohio River Division. John Wall, the Director of Civil Works, supported us, went with us over to see Congressman Perkins and took the gaff, as I mentioned, so certainly we had support from him.

As for the secretary's office, if there was a buck to be saved, they would rather save it than spend it, but I believe this just was a battle they didn't want to join. They had several others going and probably thought Yatesville would die of its own weight, the state would never come through, and so Gianelli never participated and allowed the process to continue.

Q: What about the Big South Fork?

A: The Big South Fork National River and Recreation area was on the border of Tennessee and Kentucky. It was a neat project, not well known by many folks, even today. You ask people about the Yellowstone of the East, or the Big South Fork, and you get a blank stare.

Down in Oneida, Tennessee, they know about it. It is a National Park Service park of some considerable size, 103,000 acres. It involves the upper gorge of the Cumberland River and is quite a nice area, a lot of palisades and caves—very rustic. There are old coal mines in the area, deep gorges, a lot of hills, and white water rafting and canoeing. It is very rustic.

The whole idea of the park was to provide an outdoor experience for people. It's not a "Yellowstone of the East" where you can go find geysers. What you find is the real outdoors. If you want to hike, if you want to ride horseback into the wilderness, if you want to do those kinds of things, or raft down a river, or canoe down a river, it's there. The concept was to leave it wild and rustic, not make it glitzy.

What Nashville District did to develop it was to procure the land, build a bridge over the river at the base of the valley, and construct two major public use areas—Bandy Creek in Tennessee and Blue Heron in Kentucky—and some other facilities. The existing bridge was just a low-level bridge that flooded over during high water. When the water goes down, you use it again. Nashville constructed a high bridge up and over the valley so all year long you could get from one rim to the other rim.

We also built some canoe access points and two or three campgrounds. There were places where National Park Service rangers would have a station. At Bandy Creek the Park Service would contract out to livery men who would have the horses so that people who wanted to come up and rent a horse could take one out from there. You could also rent canoes, and there were some shops to buy some basic grub and that sort of thing. Big South Fork retained its very rustic setting, and there was not a lot of construction.

Early on, Big South Fork became one of the administration's targets for reducing the budget. Originally the recreation area project was to include something like 173,000 acres. The administration objected to the total \$258 million project and cut it back. It was cut back in one of the early budget exercises to about 103,000 acres. One of the early things we had to do was submit a proposal for reducing the project. That was relatively easy to do in that certain real estate had already been procured and we could draw a line around that and clean up the borders.

There were some unhappy supporters of the project, like Senator Howard Baker from Tennessee, who had sponsored the project. He was also part of the administration, and yielded. So, about one-third of the planned area was set aside for later acquisitions. We then completed the reduced project. I visited there since it's been completed, and there are very nice facilities but maintained in its rustic atmosphere. In addition, at Blue Heron there was a coal tipple that has been restored. It was not completely rebuilt, but for the camp they put up steel frameworks to represent where houses had been. Various buildings provide pictorials of how it was back in coal-mining days. Nearby, maybe six or eight miles away, there is a town, and there is a railroad link—the old railroad for taking coal out. They now run tourist trains from the town to the restored tipple. After the train excursion in, you walk through the coal town and then come on back out. In addition, there's a couple of overlooks from the rim that you can look down into the deep gorge. It's a nice experience.

Q: How did the Corps get that project in the first place? Are you familiar with the history of it before you got there?

A: No, not really. After all, Army engineers were the early saviors and developers of Yellowstone and Yosemite in years past. We have those capabilities to build things and procure real estate, so I think we were a natural to do the Big South Fork. The legislation was written that the Corps would build it and then turn it over to the Park Service.

Q: Okay.

A: The trips down there were always interesting. Initially, when we went down there it was treacherous getting down to the river level during a rainy day. There were many switchbacks as the road cut down from the hills. When muddy, it was easy to slide off the road. It was essential, then, that we build a road down to a high bridge across and a road up on the other side if there was ever to be an all-weather access. Thus, we constructed Leatherwood Ford bridge. This bridge also provided a nice link from one side to the other. People didn't have to go the long way around.

We always had interesting times down there because it's such a very rustic area. Oneida, Tennessee, was 10 or 12 miles away. I remember the groundbreaking for Leatherwood Ford bridge. Senator Baker came down. We were to have the groundbreaking down at the bridge. It rained heavily the night before and we couldn't get to the bridge by auto, so we had it up in a local high school auditorium. They put up the flags and everything else. It was cascading rain outside, the auditorium was full, and Senator Baker and I gave our talks. We took our spades outside of the school for the groundbreaking—the bridge site was two or three miles away.

Another interesting time was the groundbreaking for the Bandy Creek visitor site, the ranger station and so forth. The locals brought a mule with a plow. The local congressman and I were to stand behind the mule and the plow, and we would break ground that way.

I remember getting behind the mule, whose name was Sam also, and the congressman looked over to me with all these photographers and people around him and said, "What do we do, anyway? How do we get this mule moving?" I said, quietly, "Congressman, I don't know, but then, the people here don't expect *me* to know." [Laughter]

So, he had a problem. I don't think he was elected at the next election. I'm not sure if it was because people recognized he didn't know how to drive a mule.

Q: That could have been part of it, though. [Laughter]

A: I always enjoyed going back there because our Corps folks there really loved the land and the project. It was just a wonderful project for anybody who really liked nature and the environment.

I remember Jim Spears was there with Nashville District working on the project, and he was quite an artist. He did paintings of birds that were lovely, really terrific. This was his country. It was a labor of love for all those people, where they were acquiring real estate, working the project, or whatever. I mean, they were doing something for their world, and they really loved it.

Q: Are there other civil works projects of note?

A: Yes, I ought to talk some about the Gallipolis Locks and Dam project. Gallipolis, located in the middle Ohio, with one 600-foot- and one 360-foot-long lock was the biggest bottleneck for barge traffic on the river. Located on a bend, it was also the most hazardous. During my time in the Ohio River Division there was considerable activity—planning, design, model testing at the Waterways Experiment Station, testimony, congressional visits—revolving about modernizing Gallipolis to provide new 1,200-foot and 600-foot lock chambers. A new organization, DINAMO, came into being.

DINAMO brought many leaders, government and political representatives, to Gallipolis to view firsthand the problem and to solicit support for the preferred solution. I rather thought there was an effective partnership of private industry and government in this endeavor. It led to authorization and construction of the badly needed replacement locks.

Q: Ready to shift gears here a little bit? In June of 1981, General Bratton—I'm sure there was a little background to this—requested you to plan for a full-scale resumption of military construction in the Ohio River Division, which then was undertaken—not too long a period before it was actually resumed. So, this, I think, is a reflection of increased funding in the military area and some other things. How would you start in describing this process of bringing in military construction?

A: It was in that time frame that several of us had approached General Bratton and said, “We think you ought to expand the number of Corps divisions and districts with military construction.”

Q: Several division engineers?

A: I certainly was one of them. As I had traveled around initially to various places, I would get the question, “How come you're right here in Cincinnati, and I'm here in Dayton, Ohio, 50 miles away at Wright–Patterson Air Force Base, and my facilities are being built by the Baltimore District?”

Or, “How come I'm over here in Rock Island, and there's a Rock Island District right here, but Omaha District does my construction?” Fort Campbell, Kentucky, was the same way. Fort Benjamin Harrison, Indiana—same way.

So, I, for one, approached General Bratton, and there were others, and said, “I think dollars are up, the Reagan budget, there's a lot of construction out there. I think we need to get back in the military construction business.”

The Baltimore District had excellent people. They really wanted to do a good job. The district engineer came out every six months just to see the commanders at Wright–Patterson and make sure that they felt loved. However, he wasn't to feel loved for another five months. The customers just didn't feel that they were getting enough hand touching. I thought that we could do that better, and we should be in the military construction business.

So, General Bratton told the Director of Military Construction, Major General Drake Wilson at the time, to open the question, come back and tell him how we might adjust our military construction boundaries.

We put together a team to analyze how we'd want to do it in the Ohio River Division. We came to the conclusion that we couldn't afford to have more than one district in the military construction business, and every one of our districts wanted to be it. We had to concentrate in one district.

As a parameter, we knew we couldn't win getting back military construction if we were profligate in the amount of people the Ohio River Division needed to do the job. We had to constrain resources, do it the right way but do it austerely, and we had to focus on customer service. The thing we were hearing from customers was it wasn't being done right.

About that time there was to be a project in Rock Island called REARM [renovation of armament manufacturing], which was a major redoing of the factory up there, which cast the breaches for our Army howitzers. They brought in the howitzer tubes from Watervliet Arsenal. Then they did the assembly for certain of our weapons—the 155-mm and 8-inch howitzers. It was almost a Civil War operation, when I saw how they were doing it—pouring the molds and machining the breach and everything else. I thought of all the old black and white blurry pictures of ancient days. Now the world was moving into new ways of drilling things out and using modern machinery to do things. So, the Army Materiel Command [AMC] and the Armaments Command had a plan to redo that whole factory complex in a three-phase operation.

We thought that an appropriate dividing line for military construction boundaries would give us Illinois, Indiana, Ohio, Tennessee, Kentucky, and West Virginia. There weren't any military construction activities in West Virginia, maybe some future reserve centers.

Q: Michigan?

A: Michigan because there was one of our tank plants, and there were some Air Force installations in Michigan as well. We were also doing real estate in some places, so we really felt that that would be an appropriate thing.

So, we carved out that as our desired area of operation for military construction. Then we went to school to figure out how everyone else did their military construction mission. That meant, how does Omaha do project management? How does Baltimore do it, and how does everybody else do it? We more or less put together a package—you might call it a bid proposal—on how we thought it was in the best interests of the Corps that the Ohio River Division get back in the military construction business, with Louisville its executing district to take care of military construction and real estate in the area described above.

After that came quite an internal debate facilitated by Drake Wilson. You might have called it a fight, with “losing divisions” arguing not to lose their areas and, of course, us saying, “Well, we really ought to do it because it's in the best interests of the Corps.”

Eventually, then, the decision was made to give us military construction.

Q: One of the things that was said—I don't know if this is part of the bargaining or whatever because it would have happened anyway, no doubt—was that you placed an area office at Rock Island specifically because of concerns that came out in this debate from the Missouri River Division that you couldn't handle the project, that they had the expertise for the complex construction that was going on there. Does that sound about right?

A: Yes, but let me put it in context.

Q: Okay.

A: We had a professional disagreement with Baltimore District, North Atlantic Division, and with Mobile District, South Atlantic Division, on mission transfers of Fort Campbell and

Wright–Patterson Air Force Base, respectively. We all made our arguments and left it up to decision by Drake Wilson, the Director of Military Construction.

The Missouri River Division didn't do it that way, though. The division called General Wilson and asked to basically have a showdown at an upcoming DEH conference we were going to have in Nashville. They wanted to meet with him and lay down why the Ohio River Division shouldn't be given military construction responsibility, and specifically the REARM project at Rock Island. REARM was a \$91 million, three-phase, multiyear project to modernize the arsenal's major weapons facility. The Missouri River Division had said publicly to AMC that we in the Ohio River Division didn't have the professional capability to do REARM. Now, there's nothing that gets your dander up quicker than having your professional qualifications called into question.

So, we showed up at the meeting and were very surprised to find that the Missouri River Division had brought AMC to the meeting with Major General Drake Wilson. We thought we were coming to a meeting to dialogue why we ought to have it, and they would say why they thought they ought to keep it, and then Drake Wilson would mull it all over and give us a decision at the right time, after conferring with the Chief. The Missouri River Division brought in AMC to participate in our internal dialogue, and then they said, "The Ohio River Division doesn't have the capability to do this project. Isn't that right, AMC?" I really thought that was not the right kind of way to work things. Since AMC was there, Drake Wilson let them have their say, and he made no decisions that day.

We countered by going up to AMC and challenged them, "What do you mean, we don't have any capability? Do you realize we've done this project and this project and this? We understand the Missouri River Division's point. They don't want to lose the business. We don't understand your point, AMC, in that the Missouri River Division hasn't done any REARM before. So, what is your point?"

AMC said, "Well, we don't know. We just want to support our good friends from the Missouri River Division."

I said, "Well, just what is it they're providing for you now? You know, we've been up here, and we hear your Rock Island Arsenal folks griping about the fact that they only have an inspector and a clerk there from Omaha District, Missouri River Division. When they go over to their office, they can't ever find anybody. The arsenal doesn't really feel served. So, why don't you talk to your DEH who is doing this and come back and tell us?"

So, they said, "Well, I guess that's right." I said, "Well, look. The way we analyze this, this project is big. It's going to last. We're going to move a major office in there. It will be headed by a GS—whatever, and he'll have his inspectors, an office of four to five people compared to the two people you have now. He'll report straight to the district; he will not report to another area office and then to the district. So, now, tell us again why you don't think you're going to be well-served with the Ohio River Division coming to do this job for you? Or why do you think it ought to be the other way?"

They said, “Well, geez, we didn’t think of it that way.”

We didn’t do that as a ploy. We figured out how we would staff various places, and we did our numbers because we knew we had to go back in and show Drake Wilson and his programming people that we weren’t padding and building an empire that couldn’t be afforded. We were really scrimping and saving on each FTE. Nevertheless, that was the plan that came in for staffing at Rock Island.

We presented our plan to Drake Wilson, and eventually a decision was made that we’d get military construction to include the REARM project at Rock Island.

One other interesting issue—and we did adapt the Missouri River Division’s basic solution in this area. We wanted to get into project management, for the question was, how do you best manage the military construction projects? Where do you put that focus, the people who are handling the money and doing project management?

Now, this is pertinent now to what the Corps later came to in terms of project management. We found out that project management was implemented differently all over the Corps. For some, the engineers managed the project while it was in design, and then the construction folks managed it when it was in construction. In several districts, though, project management was an integral part of construction. Construction folks all thought they ought to manage projects because the big bucks are there, and they could do change orders more quickly.

When we called the Missouri River Division, Brigadier General Mark Sisinyak, the division engineer, told me that he had put project management in engineering because the problems are all up front—in making milestones, getting the design done, and interacting with the user. At the time the project is passed on to the construction management folks, they’re interacting with the contractor and the user, but the potential for time loss is up front. Engineering folks with project management can still manage the money. The construction manager comes to the project manager to get a release, and he may be coming to him for design changes too.

Anyway, it’s easier to close that communication gap than it is to transfer and have a break in project management or give construction folks the responsibility up early when the engineering folks have to deliver.

So, we adopted the Missouri River Division model for project management when we started the military construction mission in the Ohio River Division. We set it up and thought it worked very well because we had project managers from the start each taking part in the process.

Q: Well, in addition to the Rock Island, there was the complex hospital project at Wright–Patterson Air Force Base that you either got or took over. I’m not sure which it was. Could you comment on that? Hospital projects—I know the ones in Germany—tend to be complicated.

A: All of them are complicated. We took over two hospital projects. One was at Fort Campbell. The design and construction had been completed by Mobile District. We really took over the project at closeout and punch list time.

I felt that Mobile District should continue and finish the project, but the South Atlantic Division said, "If you're going to take Campbell, you've got to take it all now." USACE Military Programs backed them up, and so I guess we had little choice and said, "Okay. We'll clean up your project and close it out."

In the case of Wright-Patterson, that was key to the timing of the whole transfer process because that project was about to start. It was a big project. There was consternation on the part of Wright-Patterson for the project. That had great visibility in the Air Force, all the way to the Secretary of the Air Force's office. There was all kinds of detailed guidance coming down as to how the project was to be accomplished.

The \$106 million medical center project had been designed by Baltimore District, so we took it over for construction. One key part of that project was the hyperbaric chamber. That became an issue unto itself because this was a big, regional teaching hospital. It was an Air Force medical center with a lot of instruction and teaching. They wanted a hyperbaric chamber there so that they could do research and take advantage of having a center for treatment under pressure. It's very helpful for burn cases, for one.

The Assistant Secretary of the Air Force for Installations and Construction took personal interest in the hyperbaric chamber construction. He put out a directive that the Air Force wanted the Navy's expertise, having to do with diving bells and submarines, to be involved with and pass on (certify) construction of the hyperbaric chamber.

This issue came right out of the woodwork in the 11th hour. We had been dealing with the AFRCE [Air Force Regional Civil Engineer] in Atlanta, headed by an individual who was always carping at the Corps and how we needed to be sure to meet cost goals, meet milestones. He wasn't going to tolerate any slips or any extra claims. Now we had a very late decision that said the Navy is going to be involved in the approval and design of the hyperbaric chamber, which had already been designed and we were now on the street for a contract to build it.

The late decision presented us a dilemma in how to proceed rapidly and at the same time recognize that we have a new player. How would we integrate that new player? With a lot of assistance from the Chief's office, Military Programs, we got the Navy in quickly. There were two different players from the Navy too. They had to choose which one was to be the best expert on hyperbaric chambers.

We submitted our design and asked, "Don't design us one; approve this design quickly, please." We promised to integrate their testing program and visitations so they could do what the Air Force wanted, which was to certify that the hyperbaric chamber was okay.

We had great apprehensions, and it was a lot of work on a lot of people's part to make it happen. In the end, I suppose it worked out all right. I wasn't there at the end, but that was my understanding.

The project was complex from the standpoint that we were building a major new medical center facility, after which we would gut the old 144-bed hospital and rehabilitate it. As part of the new facility, we had to take away all of the close-in parking, plus do all of the utilities work, heating and air conditioning, for the whole. There was also a large glass atrium in front.

It was a complex, ticklish project that was programmed to last over five years, in the two phases.

Q: I know some of the European medical centers got complicated also because they were partly OMA funded and partly MCA funded. I don't know whether the Air Force was involved in any of those complications.

A: Certain equipment was OMA funded.

Q: I have one question that we ought to have asked earlier that's sort of out of order, but, just so I won't miss it, but why did you choose the Louisville District to be the military construction district?

A: It was basically because the center of mass of their civil works area was in the area that best represented the military area too. We had little activity in eastern Ohio, Pennsylvania, West Virginia—the Pittsburgh and Huntington District areas. Nashville District certainly had Fort Campbell. It basically seemed to fit best for Louisville District, with Indiana, eastern Ohio, Illinois, Kentucky, and with Fort Knox right there and Fort Campbell on the Kentucky–Tennessee border.

Q: Didn't Louisville have military construction earlier? I think they did.

A: I think they had it earlier too.

Q: Ten years earlier. Not that that would necessarily—

A: Probably the reason they had it earlier was for the same basic reasons. Louisville was a large district, and Wright–Patterson was in their area. It just seemed to be the natural fit.

Q: Was the type of infighting, or whatever, that you encountered in this process of getting military construction unusual in your experience?

A: The Missouri River Division part was.

Q: Not the other part?

A: No. I thought the rest—I mean, we’re two folks who each wanted something and would make their case, and the decision makers would decide.

Q: Now, what do you think accounted for that? Was it the severity of their cuts in their civil program that maybe made the Missouri River Division sort of desperate to hold on?

A: I don’t know. The Missouri River Division has always been a strong, strong division. Not many districts, but Omaha District was the one involved here, and they had that very special arrangement with Strategic Air Command and all the Air Force work. They also had the center of expertise for Superfund. So, I don’t know.

I think their attentions were everywhere else but Rock Island. That’s why Rock Island folks would say, “Hey. We never see anybody but this GS—whatever.” One of the lessons we learned from these dialogues was that our chief of construction and district engineer had to get in a car and drive around and drop in on folks every now and then to show that there was great care coming from Louisville.

Q: Of course, Rock Island has a district engineer, but he’s in the North Central Division.

A: That’s right. He was up there, and so there was still that dichotomy. Even their people would ask. Louisville District turned work over to Rock Island District to do because we had the one-stop services program to support installation DEHs, which was coming on about at that time.

Q: Yes.

A: We took it on as a philosophy to begin with that we would turn over to Rock Island District things that they could better take care of. Not the big REARM project because those kinds of projects take great tracking back through the whole system. For the small projects, servicing with design to the local DEH. The DEH would call us and say, “We have this project we’d like you to take on. We need design, and get us a contractor to do this project, like a parking lot or some kind of a thing, on the one-stop basis.”

Louisville would say, “Fine. You’ve come to your one-stop person, and we’re going to deal it to the Rock Island District Engineer and he’ll call you.” Louisville would pass the project to Rock Island, and thereafter all contact would be between the arsenal and the Rock Island District Engineer for the design and construction. Louisville was a pass through—they were the one-stop call. The idea was that an installation would not have to call around and figure out which district will do a project. Just call Louisville, and they would take care of the rest, arranging it with Rock Island District. That way, Louisville wouldn’t have to send another person up there to be handled by their folks on a chargeback basis.

It really worked out rather well. At the time, Drake Wilson wasn’t just considering which districts to put back in military construction, but also which divisions too.

An early comment was, “I don’t plan to put the North Central Division back, I can’t afford to put it and the Ohio River Division both back in.”

- Q: I don't think the North Central Division had maybe ever had much, if any, military construction.
- A: Yes. When I was deputy district engineer as a captain in Chicago, we had military construction.
- Q: Okay.
- A: We also had supply and procurement, a huge operation. That went to AMC.
- Q: We talked about some of the challenges of REARM and Wright-Patterson. How about in the tank area at Lima, Ohio, or in Detroit.
- A: Lima? We had some projects coming up there.
- Q: The Abrams tank was—
- A: Yes. It was in production.
- Q: Okay.
- A: At Lima, there was a \$26.5 million expansion of the plant to add 330,000 square feet. There were also projects for improvement of the existing plant in Detroit.
- Q: Organizationally, within the division office, the Military Construction Branch was in Engineering with Carl Betterton the chief. That was a change, I guess, that resulted from taking back the military construction responsibility.
- A: That branch was the one I set up in Engineering Division modeled after the the Missouri River Division's approach. Once we did that, then we gave Jack Kiper's Construction Division one or two more people to help out in construction management. That was about it, I think, from the standpoint of division staffing increases.
- Q: How about military accounting? Maybe that was in finance and accounting.
- A: There might have been a requirement for four or five people. I don't remember. We had a centralized finance and accounting, you see.
- Q: That was in the division?
- A: At the division level. We separated support when we talked about division. We would talk about the 115 or so folks that were in the headquarters downtown in the division office. The centralized support, like finance and accounting, would be accorded to the districts as if they were districts. We would do the breakout of how we charged project support and put the finance and accounting part on the districts, even though they were collocated at a site in Cincinnati.

Later on, when we reorganized the personnel function and went to a centralized shop there, we did a similar kind of thing. In the Corps' sense of accounting for personnel, there are those in districts that are charged out certain ways and those in divisions that are overhead. So, we always had to be careful to ensure that we were addressing FTEs that were really district level work, collocated for efficiency as district kind of FTEs.

Q: Different from overhead?

A: Different from overhead, which was the division.

Q: How about in the military real estate function, which came at the same time, the recruiting stations, for example. I think this was one of the biggest areas that any division had.

A: Yes, it was.

Q: I think you were the lead in that.

A: Yes. I think in numbers of activities we were very big, I guess, because of Chicago and Detroit and Indianapolis, Nashville and Louisville. I mean, those kinds of places, including Columbus, had large numbers of recruiting centers.

Recruiters were always changing centers. I mean, it was endemic to that business that each year they would decide that they could improve recruiting if they could just have that better location down the street. So, there was a high turnover business.

So, our people in Louisville were very active in that business, and there was a lot of road time spent doing that.

Q: Now, was that handled out of the Real Estate Division, Louisville District?

A: Out of Louisville District.

Q: Those were probably leased, weren't they?

A: Yes, leased.

Q: For recruiting?

A: Yes.

Q: In terms of land acquisition for military bases, there probably wasn't a whole lot of activity.

A: No. Our real estaters also handled installation contract property use. If there were contracts, like at the Indiana Ammunition Plant for farmers to graze cattle, then that was handled by Real Estate. If there were timbering contracts, that was handled out of Real Estate as well. There was a large amount of activity in that respect at the various installations.

Q: I am interested in a couple of different types of questions, if we can change subjects.

A: Yes, sure.

Q: You were also, as division engineer of the Ohio River Division, a member of the Mississippi River Commission.

A: Yes.

Q: What sort of activities were you involved in with the Mississippi River Commission?

A: I knew very little about the Mississippi River Commission until I became a commissioner and found that it was a very interesting part of my job. I enjoyed it professionally because it opened new vistas of understanding of our nation, and an important component of the Corps' contribution to the nation.

Forty-one percent of the 48 continental states of the United States drains out past New Orleans into the Gulf of Mexico, and it goes down that waterway. When people talk about the Lower Mississippi Valley Division being the premiere division in our system, they do it with some reason. There are other competitors, like the South Atlantic Division with its multiple responsibilities in South America and now in the Middle East. The South Atlantic Division has major military installations—Bragg, Stewart, Benning—and during my time had responsibility for the large Tenn–Tom project. The responsibilities that befall the division engineer in Vicksburg in time of crisis can be as big as anybody's. He has to make decisions based on what's tumbling down the Mississippi in cascading amounts of water.

So, I always appreciated Major General Bill Read's job. He was the division engineer at the time and the president of the Mississippi River Commission. Of course, I had worked for him in the ACE's shop, where I'd been his deputy.

The Mississippi River system is operated by the Mississippi River Commission—the Lower Mississippi Valley Division less the St. Louis District—that is Memphis, Vicksburg, and New Orleans Districts. It is an open river—no locks—and they have engineered it and trained it to keep the flows available for navigation and to be able to fight flood flows. The Mississippi River tributaries project has all types of systems—levees, floodways, tributary dams—the Morganza Floodway, Bonnet Carré Spillway, the Old River control structure, and the Atchafalaya River are the measures by which they do it.

The key reason for my being on the commission or, say, the position of the division engineer of the Ohio River Division, is the fact that the Ohio River can be the biggest contributor to floods in the lower Mississippi. The Missouri has a component. The upper Mississippi certainly has a component. I mean, you can get rains anywhere, but the real design storms for the catastrophic flood on the lower Mississippi is a major storm centered over the Ohio basin, and basically centered over the main stem of the Ohio.

Recognize that the flood control apparatus, the 76 dams that I mentioned earlier, are up the tributaries. So, if you get a storm centered over the main stem below the tributaries, you're getting water that hits directly into the Ohio. Not well known to the layman is the fact that

the Ohio River locks and dams are not there for flood control. They are there for navigation—to maintain a nine-foot pool for navigation.

Those main stem dams don't have a flood control component; they don't back up water and hold it for flood control. When floods occur, the gates are opened, and natural flows occur. So, you get a lot of water coming from the Ohio into the Mississippi system.

Within the Ohio River Division there's a tremendous system established for reservoir control, centered out of the reservoir control room in Cincinnati. It uses measuring gauges at all of the various tributaries and lakes, connected by satellite. The satellite retrieves the data day and night as it's going over these places and feeds the computer system in Cincinnati, which links to Vicksburg. Our division reservoir control folks talk to the ones in Vicksburg who are measuring the lower Mississippi. They make a determination as to what the flows are and what they expect it to be at the gauge at Cairo and on downstream.

Cairo is where the Ohio comes into the Mississippi. With the Missouri and upper Mississippi already there, that becomes a pretty important point for gauging. Our ability, then, to control flows into the Mississippi might or might not be limited, depending on where the waters are and what we've done on these upstream dams.

Within the the Ohio River Division area is the Tennessee River, which is operated by the Tennessee Valley Authority. The division is supposed to give the Tennessee Valley Authority instructions as to what to do on the Tennessee, and they're supposed to abide by our instructions.

Basically, in Vicksburg they're watching the curves of the water and communicating to us, and we're communicating to them. We're saying when the next Ohio rise is expected to arrive at Cairo hours and days in advance. They're reading from the North Central Division and the Missouri River Division what the flows are coming out of the upper Mississippi and Missouri, and they can predict stages. They can then say, "We expect the Missouri to reach Cairo at such and such a time three days hence. If you can hold anything back and prevent your rise from either getting there before or after, please do so."

So, in Vicksburg they try to work out those kinds of things to take care of the flooding. It's important at Cairo because of the New Madrid Floodway. If needed, the New Madrid Floodway is opened by blowing the levee and letting the water divert down that floodway, which wipes out a lot of farmers and their properties and their investments. That became an issue when I was on the commission. The local farmers in the floodway were seeking to find some way to prevent the Lower Mississippi Valley Division from blowing the levee to make the floodway happen. That was one of the things Bill Read had to wrestle with, so I can't expand on that much more.

When I was at Belvoir, we were developing the TEXS [Tactical Explosive System], the liquid explosive system that we never were able to bring into the combat engineer inventory. However, the Lower Mississippi Valley Division used that principle, preparing the pipes and

having them ready for liquid explosives, to prepare the levees for emergency demolition to make the floodway.

Well, anyway, my joining the Mississippi River Commission had the additional value of my better understanding my responsibilities upstream.

The Mississippi River Commission has multiple events, two of them being the annual low water and high water trips. Taking the motor vessel *Mississippi*, the president of the commission, his staff, and the other commissioners make an inspection trip down the Mississippi to New Orleans on one trip, and down the Atchafalaya to Morgan City on the other.

During that trip the commission holds hearings daily aboard the vessel tied up at Memphis or Vicksburg or other ports. People come aboard, especially from the levee districts, and report on status or concerns with the project. The district engineer, in each case, gives his report so all can hear his report. Then the others come up and provide comment and thus develop issues that will be addressed later by the commission and commission staff. General Read, as president of the Mississippi River Commission, presided at the hearings.

This was an interesting time because of several things. One was the New Madrid Floodway issue that was controversial. People were coming aboard addressing the commission and arguing the fact that the floodway was obsolete and shouldn't be continued. They later carried that argument to the Congress and to the administration and to the courts.

Second, the whole issue of the Atchafalaya was still in question. That was, what is the right thing to do to protect the environment of the Atchafalaya? We were embarked in planning for starting with the construction of the second control structure where the Atchafalaya left the Mississippi. The first one had been badly damaged in previous floods. There was always a tension about whether the new one would be built in time before the next flood came down and threatened it.

Finally, there were the arguments down at Morgan City on the floodwall project. This project was being opposed by environmentalists and the oyster fishermen. They were saying that the lack of fresh water was allowing saltwater encroachments and thereby destroying the oyster beds and that we were destroying the whole Louisiana coast down there.

Finally, there was the question of saltwater intrusion up the Mississippi during flow regimes and the viability of the New Orleans water supply.

Open channel engineering was not something we were involved with in the Ohio River Division, so this was a whole new component for me, and very educational and very enjoyable to participate in.

Q: I'm glad you remembered that because I had it on my list.

A: Beside the annual trips, we also had meetings from time to time, typically in Vicksburg. That would be run much like our Board of Engineers for Rivers and Harbors meetings because

projects in that area were passed on by the Mississippi River Commission, not by the Board of Engineers, and then would come to the Chief of Engineers directly. The Morgan City flood wall project was one of those, with its many controversies.

There would be hearings in the hearing room at Vicksburg in the commission offices, presided over by General Read. The commission would meet, and we'd all vote on the projects. Some of those votes were quite close, like four to three.

Q: Humh. You would later be on the Board of Engineers?

A: Right.

Q: When we were doing our interview on your time as Deputy Chief, you referred a couple of times back to your experience in the Ohio River Division, and you were doing this in the context of the relationship and as ACE headquarters from your perspective—now in the headquarters, but back then as division engineer—and the things you remembered about that experience that were troublesome, I guess is the word to use.

One of the things that you said is that getting guidance and decisions out of the headquarters took too long to make things happen. I wonder if you would say a little bit more about that, now that we're talking about your Ohio River Division time. How much of a problem was it really—resources you mentioned. I think what you were getting at was that there were some pretty critical things sometimes that took too long.

A: Well, I think resources was a prime one and a thing that we never have solved at the headquarters, even now. Even when I was deputy there was a question as to who really controls the resources. There was always an argument—does the Director of Resource Management control the FTEs, or does the Program Manager, Director of Civil Works, or Director of Military Programs control them?

Sometime when we asked questions from the Ohio River Division—and I'm going back to that point—we would get the view, "Well, the comptroller or resource manager did that." We'd call that office, and the finger would point back, "No, that was Civil Works who did that." So, part of the issue was trying to find where the buck stopped so we could grapple with it at the staff level. Now, you could always get Bory Steinberg, and I don't remember who the resource manager was in that day.

Q: It was Colonel [Clarence] Gilkey.

A: Basically, Bory would get aggressive at the staff level. It was just tedious to work through. You had to raise it to a Bory level to really get a direct answer, and he wouldn't always agree, but that was all right too. I mean, that's what people are supposed to do, stand up and be counted. Then we would raise the issue up to the director level.

There was a continual resource issue thing. It was annual, but came more often because there was a midyear review, and then somebody decides to cut something. One rather famous issue was when, in midyear, Bory's people decided that we weren't using our civil works

operations FTE allocation that year. Therefore, they were going to give us a midyear cut—I mean, some sizable number, like 60 FTEs.

We answered, after doing the homework, “Wait a minute. You’re not reading the charts right.” It was not a linear chart. We are talking about a chart line that is flat at the beginning and then ramps up come spring and summer when we use most of these funds. Figure out when the fiscal years are and recognize that we start bringing on temps to work in our recreation areas in the late spring time frame. We start bringing on people to augment our work crews out doing summer work on the locks, the dams, during that same time frame.

It was not a linear relationship. That is, you don’t plot that we use everybody straight-lined, one for one all year long. The fact that the USACE staff was measuring in January says that they should not be measuring up at the straight part of the curve. It would be down on our projection. Our argument was, “Don’t measure against what *you* thought we should do, which we think was erroneous. Measure against what *we* thought we would do when *we* asked you for those FTEs and *you* gave them to us.”

The answer came back, “You will never, ever use them.” We said, “Oh, yes, we will use them. We’ve got plans to use them. They’re right in our projection.”

I mean, we diddled with them at the staff level for weeks. Then we got to Bory, and Bory didn’t support us, and John Wall, the director, brought me in and said, parroting what Bory’d said, “You’ll never use them.” I said, “Oh, yeah, we will.” He finally said, “I’ll bet you you’ll never use them,” and I said, “I’ll take that bet.”

So, at the end of the fiscal year, turns out we used them. Except they never changed their numbers. [Laughter]

The interesting thing was that the Office of Management and Budget called the Corps on the carpet for overusing their spaces that year. I don’t remember what the numbers specifically were, but it might be on the order of 10 over. We’d used 60, so the other folks had fallen short and not used theirs, and therefore we’d used basically the rest of the Corps’ allocation. So, Civil Works had responded through Gianelli as to why USACE had gone over.

About the same time there was some sort of a personnel newsletter that goes out to all federal agencies, and it basically said: “Use them or lose them. Only four agencies used their allocation this year. Plaudits to X, Y, Z, and the Corps of Engineers for fully using their capability.” Then it listed all those other agencies that shot way below their number.

So, I called up John Wall and told him, “You received the compliments of the newsletter. I hope you accept that. When you write Gianelli back, just say we didn’t count very well, or whatever. [Laughter]

Nevertheless, you received compliments for having the foresight to plan and be very close.” I mean, what’s the difference between 10 over versus not using to serve your country 200 man-years of effort? In the Ohio River Division we used the man-years of effort to good avail in

serving the folks in the Ohio Valley. Anyway, I got my hand smacked, but I accepted the bottle of Scotch he had bet me. [Laughter]

Q: Were there other areas of that relationship of the headquarters with division headquarters?

A: I think part of that we talked about before. You have to recognize the headquarters at that time was deeply involved, especially toward the last, in changing policy developments with the secretary's office. There were lots of times where they were trying to sort out things, not knowing how they would sort. So, there were time delays because of that.

Frankly, I think, in some cases, some of the things we had to send over to the secretary's office, he would sit on because if he would sit on them, then the Corps wasn't spending money, and that was a goal of the administration—to hold down federal expenditures. If he could keep it in suspension, then action wasn't being taken and so one can't necessarily fault the Director of Civil Works for not prosecuting these things. He had the problem of trying to work out the issues and the process.

Now, where that befell us was, again, my comments that I thought the secretary did not respect the Congress and their staffs who really knew how the process worked and knew they had to keep the pressure on the office of the secretary for answers. They always knew where projects were because they'd call and say, "Where is this?" The answer would be, "Well, we sent it to USACE on such and such a date." Then they'd call headquarters, and they'd say, "Yes, that's correct, and we sent it on to the secretary's office on such and such a date."

So, then they'd call over to the secretary and put the pressure on getting it out. Then it might come back down, back up and back down, as we all sorted out the policy kinds of things.

I think my comment that it took too long is really answered in those two kinds of things—the fact that it just seemed too often that we had to call up and get answers that should have already been developed and sent back.

On the military side of the house we were just getting into that, and on the resources side I know that we felt that we had convinced Drake Wilson and his folks, and they'd tell us they agreed on those numbers. But then it would go over to the resource manager, Colonel Gilkey, who would want to work it, but he didn't have time to work it.

So, it would take a while to get him to verify, validate, or disagree with what we already thought we had through the Director of Military Programs. If he validated it, that was fine and we got it, eventually. If he disagreed, then we'd have to go through the whole process again, back to Drake Wilson, get those two together to come to grips with each other as to the right answer.

I think those were the sense of my comments.

Q: How would we relate another comment that you made about, "We need a higher headquarters that acts like a higher headquarters?" I mean, does that pull in some different kinds of things as well?

I forget the context in which we were talking at the time. This came out of our discussions when you were deputy.

A: Interesting comment. While I was at USACE headquarters, sometimes some people wanted to get into execution, which basically should be down at division and district level. At USACE we've had difficulty really coming to grips with what is our role, and what is policy, and making the program decisions, and coming to be definitive in a responsive time frame in the fact that resources have to go up and down hill, as I've described—that is, from USACE back to divisions, and then reallocated and impacts developed from below, and then communicated back up. I mean, you shouldn't dawdle over that kind of a process because you forget, and then it all has to be re-explained, and then that's lost effort.

So, the more disciplined—precise is not the right word—you can make the process so that each level is doing the right thing and have to address the realities, then the better off you are. This really means for resources you want to allocate bogies, get the impacts back in, get a decision at the top, communicate that decision back, ask for impacts, get the impacts back up, adjust your staff level decision recommendation, send it to the decision maker—the Chief of Engineers or deputy, whoever it is—to make the decision.

Dragging out the process doesn't usually make the inputs any better. What you really need to do is to make sure you coalesce the folks to make the decision in a time frame that's right. I think, as complex and difficult as the Army Staff process is, they do it right with Program Analysis and Evaluation who puts it together, and they meet time frames because they get a program/budget schedule from the Department of Defense and have to go back up in a certain way and time frame.

So, Program Analysis and Evaluation gets the people together and they make their decisions, ask for input, and have to meet certain windows. You don't mess with the process. If you want to play the game, you'd better sit up and have a program and playbook and do it because the defense process will leave you behind.

With the Corps, I think we have the capability of being a little more flexible in our process, but then probably we get too sloppy at it and say, "Well, okay, so we didn't get it Tuesday; we'll get it on Thursday." Then at the headquarters there is not the recognition that that has an impact downstream in the division. When you do go back, then, on Thursday, maybe that doesn't give the division enough time to develop their impact and turn it around.

So, the Army/defense system takes care of that by putting the whole calendar out and staying disciplined to it. Everyone knows the key dates from the start. We're a little more informal in the way we've done it in the Corps, and that leads to not always doing it in a good, disciplined way.

Q: Compared to other assignments that you had—not just Ohio River, but being a division engineer—how did that measure up?

A: I enjoyed it a great deal. How does that stack up against other assignments? I don't know. I've never had a bad one. Some are better than others. The Ohio River Division was better than a lot. I really enjoyed the great professional challenge, great people, a lot of friends. I enjoyed the interactions, worked hard, and enjoyed it.

Q: Okay. I don't know if you want, at this point, to say anything about—I guess you know some of this was going on before you retired in terms of reorganization, and the plan that got shot down included closing some divisions—not Ohio River, but some divisions and districts. The new approach that's being taken now is to look first at the divisions, not with any—you know, it's like going in tabula rasa, the secretary says.

A: What does that mean?

Q: Well, that means without much reference to the previous plan. In other words, they don't have a plan. There were some things they liked about the earlier plan, and there is a lot that isn't very popular about the earlier plan, but that the Corps clearly needs to reorganize and clearly needs to get more efficient.

If you see any perspective that you could provide to that in terms of just not a specific division but the overall issues that are involved. If you want to say something about that now, fine.

A: Sure.

Q: It might be a good way to close out here on the division.

A: Well, while I was in the Ohio River Division, you know, we had a very quiet look at reorganizing the divisions in the middle of the United States. The people that were involved in that were the commanders of the Lower Mississippi Valley Division, the Missouri River Division, the North Central Division, and the Ohio River Division, under General Read who was the head of the study effort.

Our charge from General Heiberg, Deputy Chief, to General Bratton was to get a look to see if we could come up with some plan to do something in the middle. We met several times without staffs but involved staffs on our own when we went home.

In our meetings, typically, we'd fly to St. Louis and rent a room in a hotel near the airport. General Read would preside with the three of us, and he'd have a person there take notes and run the Vu-Graph projector. We'd try to carve out a rationale for what might change and why.

I don't know if we ever recommended anything specifically, other than we looked at some alternatives and gave the pros and cons of each and addressed them forthrightly. We came pretty close to what the last reorganization group came up with.

For example, it was clear that we didn't need all three divisions—the North Central Division, the Missouri River Division, and the Ohio River Division. Certainly something could go

there. We tried to play with what we would do with districts and that sort of thing at the same time.

We tried to take a special focus on the Missouri River Division and the responsibilities of the Air Force and how we'd address that. The North Central Division, we came down to, was the most vulnerable. The problem was, "What do you do with the responsibilities of the commander, North Central Division, with respect to Canada and the Great Lakes?"

One of the schemes we came up with basically took the Ohio River Division and the North Central Division, Detroit and Buffalo Districts, and put them together. The problem was, I felt fully employed at the time as the Ohio River Division Engineer, and didn't know whether I would get time to go do the Canadian. That was a sticky wicket there.

Then the thought was that St. Paul and Rock Island could go to the Missouri River Division. So, we might end up with the Lower Mississippi Valley Division and then two at the top. Of course, the more recent plan came up with a single at the top—the Ohio River Division.

Out of all that, and having thought about it a lot from my time in Civil Works and as deputy, and down in the Ohio River Division, and having participated in this study of the center, and being in the Mississippi River Commission, I thought that the plan the Williams group came up with was brilliant. It really addressed a lot of things and kept things about the right balance.

First of all, there are some folks who say, "Why do we have to have the division level?" I say, "You really need divisions. I mean, our districts' perspective is, frankly, pretty narrow. They bring a very local bias. Now, the locality might be as big as a state and a half, but their bias is much more local."

You start confronting ideas with ideas at the division level, and you need that one-up review that comes not only in engineering design but other things too. The pressure put on the regulatory program came from me at division. The pressure put on closing Kentucky River came from me to Louisville District, who didn't want to do it.

Huntington District would never have solved the Yatesville Dam situation because they just would have thrown up their hands and said, "We can't do it. You go tell Congressman Perkins." Or, "All we could see is go buy it for \$50 million." Neither of which was really a responsible position.

It took the division to guide district solutions. Now, when I say division—I don't mean just me. I'm talking about my strong staff—Dick Armstrong, Jack Kiper, and Jimmy Bates and their staffs who worked out all the details, who'd come up with alternatives and challenge with the "what ifs." I mean, you need that mature, experienced-level kind of thing to develop comprehensive regional solutions.

I don't think Huntington could have done the EPA job with Chemdyne without the division. There was another case where Huntington District would not give a permit to the developer of a privately developed power site at one of our main stem dams on the Ohio—an

administration initiative, if you'll recall, for the nonfederal development of hydropower. The district would not permit the developer to bring high-tension lines across the locks.

In fact, Huntington had a good rationale, but, also in fact, they'd taken a lot of weeks messing with it, not solving it. The people pushed them, wrongfully so, and had even ordered the steel that was now on site. So, here was the dilemma: "You [Huntington District] are thwarting us from doing what's necessary."

We, meaning the division staff, worked out the solution to that problem, not the district staff. They did their level work, but we forced the tough engineering analysis and questions and answers that brought about a rational solution.

There's another example: the Tishomingo County roads. We were asked by Congressman Whitten to look at the roads we were destroying in Tishomingo County near the upper part of the Tenn-Tom project. Congressman Whitten's point was that Mobile District was not doing that down in their area. "They're taking care of the roads and paying for the damage. Why aren't you?"

Nashville District was adamant that there was no federal interest in doing that. So, I had our staff look into it. When you come right down to it, we had fixed up a contract that was different from Mobile's. Mobile was running their haul road right down the middle of the project, so that's why their roads were not damaged. We were hauling huge stone in mammoth trucks over county roads for some distance. The roads weren't designed for that load, and we were destroying them as a result of our activity.

Did we have a responsibility? I thought so. So, once again, we worked the solution to come up with how those things could be taken care of and the county reimbursed for the damage we were causing. It would never have happened at the district level. It would have just remained an issue.

So, I think divisions are an important and responsible level. We should not get rid of divisions. They need to be there. The USACE headquarters should not be in the execution mode. The translation point between policy and planning and programming and execution is appropriately at the division level. So, we need to have them.

Do we need to have as many as we have? No. I think the solution the recent task group came up with—the Lower Mississippi Valley Division and having divisions in the southwest and northwest, southeast and northeast, and then in the upper middle, is the right kind of solution.

I also thought that the way they split Southwest Division was brilliant. I mean, I'd never thought about their going away. It was always a very strong division, but when you really come down to the numbers crunch, that does make a logical kind of split.

Also, I think keeping one in Cincinnati makes sense. I mean, everybody will say, "Well, you were there," but in essence, with the prime role the Ohio River system has and the biggest lock system that we've got on the waterways, that says that's going to remain an integral thing that needs to work.

Omaha District would certainly remain to do that in a diminishing era for the Strategic Air Command, but they could get their oversight from somebody else.

So, if the Ohio River is the one with the largest number of locks, then running the Illinois system and the upper Mississippi system of locks falls within that framework too. I wouldn't have guessed all those components—Little Rock has always wanted to be part of the Lower Mississippi Valley Division—but I really thought it was a good plan.

Q: I wonder if it will be politically easier to sell the division reorganization than go back and sell the district? If the district is more sensitive? You don't think so?

A: Well, I don't know how you can do the two parts.

Q: Well, I don't know that they're going to implement anything. They've got \$5 million in the '93 budget.

A: To study?

Q: To work towards it.

A: I mean, part of the division is supervising districts, the point of delivery.

Q: Yes.

A: The real question is, "In how many places?" What do you need at the point of delivery of services, and then what layers do you need to provide support to that point of delivery? Point of delivery is area offices, and parks, and locks and dams. I mean, really, subdistrict offices. Then where are the logical places you need to put districts that have to service them?

Like on the Ohio, we figured we had to have two repair fleets, one to serve Louisville District and one to serve Huntington and Pittsburgh. I don't think they, the districts, ever came to that conclusion. So, then, how many engineering and construction offices do you need to take care of the activity generated in terms of construction and design in an area? Then what's your level of review over that? Then tie them together, do the Canadian interaction, do the testimonial interaction, and pull that all together on a regional basis.

What you come down to is six or seven divisions in the continental United States, so they probably had that right.

If you don't talk about what districts to close or contract, then you're maintaining folks down there that you don't really need. You have to address districts somewhere.

When we did our study, one of the factors always was taking down a Corps flag. As long as you take down a Corps flag, somebody will object. The people in that office will write their congressman, and that mayor, that governor, or that congressman will object that you're doing something to their flag.

You know, when you pass laws like Senator [Pete] Domenici did that say you can't close an office so close to someplace else, or Senator [Fritz] Hollings, South Carolina, did for the Charleston folks, or [Dan] Rostenkowski in Chicago—I mean, there's a big guy everywhere.

Q: Right.

A: At one time, in the Ohio River Division, we had both the Senate majority leader and the Senate minority leader in our area of operations, Senators Howard Baker and Robert Byrd. Congressman Whitten was there with the Tenn-Tom in Mississippi. We had some good folks.

So, if anybody wants to make sure nobody objects, you're never going to get there. So, the Corps had a plan, and it was in the base realignment and closure plan and the right place, and I think the Bush and Clinton administrations and Congress lost an opportunity. It had been done right.

Q: They lost the appetite to implement it?

A: Yes.

Q: One quick question. When the Central Division study with the division engineers was ongoing, about what's the time frame on that?

A: I would suppose it was—I left in the summer of '84—in the winter of '83-'84. I might be wrong.

Q: We might not find any record of that. You said it was a quiet one.

A: It's probably in General Heiberg's personal files.

Commanding General, U.S. Army Engineer Center and Fort Belvoir¹

Q: In the summer of 1984 you became commanding general of the Army Engineer Center and Fort Belvoir. Could you have been better prepared for the job?

A: I don't really think so. I believe my background of assignments, experience, the fact that I had come up through the ranks and served in almost all kinds of engineer battalions, had served in both heavy divisions and light airborne divisions, had served at Corps and at division, commanded a combat heavy battalion in Vietnam, and worked at not only a troop unit level but also at major Army command level and Department of the Army level on staffs, that I really knew how the Army worked, how units worked, and how things needed to be done, knew a lot about engineers and training and professional development, and therefore

¹Interview conducted by Dr. John T. Greenwood on 29 June and 13 July 1987 at Fort Belvoir, Virginia.