ASHRAE Leadership Recall (formerly Leadership Recalled)

Transcription

Video Interview of: Roderick Kirkwood

Date of Interview: June 29, 1992

Interviewed by: Mike Kearney

Mike Kearney

Hello, my name is Mike Kearney and I'm here in Baltimore with Rod Kirkwood and it's my pleasure this afternoon to chat with Rod about his tenure as president of the ASHRAE society during the year '73 to '74. And Rod we're here in beautiful Baltimore, here on the 29th of June, 1992 and we're happy to have you here and thank you for coming and look forward to what you have to tell us about your years in the ASHRAE chairs.

Roderick Kirkwood

Thank you Mike.

M.K.

Back when you were president what was the focus of activities that ASHRAE was engaged in at the time?

R.K.

Well in 1972, you may remember, early '73, we had long lines at service stations of people waiting for gas for cars and there was a energy shortage that was a significance. I'm inclined to refer to it more as a distribution shortage really than an actual shortage. Never the less it was a problem that could come to everybody's attention. So it was an area of public concern. Along with this there were a lot of people talking about how energy should be used, what should be done about it. For example I think it was New York Professional Engineers society proposed to shut off all the air conditioning in the buildings in New York in order to reduce the energy. And such a thing would have been a disaster if you stop and think about it. Saving energy would have been peanuts compared to the damage done to the efficiency of the people working and the buildings in New York were designed to operate with air conditioning in order to provide for the efficiency of the people and as well the comforts for living areas also. It was solutions of that type that were frightening actually for fear that people that didn't know how energy ought to be used and conserve it would set up rules for everybody else to live by. The federal government was into it, there were a lot of people into it, the vast majority of them were a lot more into the emotional end than the practical end. So it became necessary for ASSHRAE to pay attention to this. I started in with a theme of the year, optimization of energy utilization. Not the word conservation but this would result in conservation without destroying what was being done throughout the country. During the course of the year, I received a note from Press McNall of our Society who brought up the point that the Bureau of Standards had been asked to write an energy code for NCBCS which was a building code, national building code group. (Ed. Note : NCBCS is National Conference of Building Codes and Standards ) And on that basis I wrote and volunteered the help of ASHRAE to the Bureau of Standards in developing

what they were going to come up with in guiding, or revising, or reviewing. They came back to me with a suggestion that they were going to have a draft available and would like to have the opportunity to present that to ASHRAE. So I told them, NCBCS as I recall, and asked for a copy of it so that we could have some preview of it before our winter meeting in January of '74 which was down in Los Angeles. They sent a copy ultimately, I got it in time to take a quick look at it, made copies and distributed to all of the technical and research committee chairman so that they would have at least an opportunity to look at it and perhaps discuss it with some of their committee people. We got to Los Angeles and by this time there were a groundswell within ASHRAE which essentially was taking pretty much taking the position that what we were trying to face off on getting ASHRAE to put their stamp on it and turn it loose on the world. It was not what the purpose was. The meeting we set up for reviewing this in Los Angeles, grew in fairly large proportions so we ended up in a major ballroom area in order to have enough room for everybody. And by this time it appeared that since it was, maybe not quite a lynch mob but pretty close to it, that it was necessary to, since I had started this thing to take the chairing of the meeting over myself and so I did. Figured they were less likely to hang the president then they would be else in the society. So on that basis we had a discussion over what we did was the national Bureau of Standards of representatives presented what they had accomplished in attempting to put this thing together and they were free to admit they were a long ways from a finished product but they were at least concerned about the appropriateness of the product that they were turning out. We got a very large response, but it became, instead of an emotional one, it became to develop into an engineering response. And before the meeting was over there was an understanding that this was not something that anybody was asking for a rubberstamp on or a stamp of approval or an attempt to railroad it through. Instead it was an effort to accomplish an end result.

M.K.

Rod, was there a awareness that there was very close scrutiny being paid to the development of this energy standard that you were working on?

R.K.

The subject of the energy standards of very great importance to everybody there, no question about it. It wasn't a casual thing. I recognize it as being a matter of extreme national importance and importance to them as individuals as well as the society. And they were taking, as ASHRAE members normally do, they were taking then a real engineering positive view of how something could be done before that meeting was over. Following the meeting I talked with the National Bureau of Standards people, please suggested that as far as they were concerned, they would like to turn the whole subject over to ASHRAE to do. But it was urgent to get done. However they were not at liberty to turn it over to us. They could recommend to NCBCS that they in turn, turn it over to us. And we came to an agreement that they would attempt to do that. On that basis we put together our team to accomplish this. We set up committees. We talked about how to do it, how to break it down in order to be able to do it quickly. And I invited the illuminating engineering society in as a participant since lighting is a major portion of energy use in buildings. Also I invited the American Suit of Architects in to develop the section on the envelope of the building. So we had that pretty well put together in fairly short order as to how we would go about doing it, done some advance work on it before we got to Los Angeles meeting. The biggest problem we had was how to fund this. There was no government subsidy. There was no funding. NCBCS had no money. So it was part of why they used the National Bureau of Standards

although we were almost a subsidiary of that. But they were funded to the extent that they were by the government and we weren't. There was no set up to fund this. So the problem with funding became extremely important. We had scheduled and increase in dues but it was increased to cover the normal impact of inflation. And that was scheduled for the following year. I went to the board of directors with the package essentially of what we needed to do, what we would expect to do, assuming NCBCS asked us to proceed with this. And the first point that I assured them was that we would not accept the effort on a basis that we would take the, what the National Bureau of Standard had done and simply continue it. I strongly would accept it on the basis that it would be reference material to us but it would be an ASHRAE standard done by ASHRAE in ASHRAE's own way. That's the only way we would accept it. If we did we had the committee organization organized enough so that we were satisfied how it would be set up. But we lacked funds simply for the process of publishing it and for review. And this would be a multi page standard obviously and would cost us a fair amount of money to publish so we needed to raise funds. On that basis we needed to move the dues increase up a year but we need to increase it up to 50% of the dues everybody was already paying. This was a great concern to many of the board members. There was a lot of discussion and the biggest concern was that that kind of increase in dues would result in a loss of membership. In the discussion that we had I went back and forth a whole lot, but the fundamental point that I made was that we had to do it. We didn't really have no real choice, there was no alternative. It had to be done. If we didn't do it somebody else was going to do it and it was going to be a disaster. It had, at least all the opportunities to be a disaster. If ASHRAE did it, it would be done right. But we had to do it very quickly. It wasn't something we could debate and review again in June. It needed to be done by June.

M.K.

Now this was at the January meeting that you were doing this and you were to have a government project completed by September.

R.K.

Yeah.

M.K.

Good luck.

R.K.

It was, it was a very ambitious program. But I think there was a lot of energy from everybody that was there that made up maybe for the national shortage of energy. But at least it was there and it needed to be funneled or channeled. The ultimate result was that the board of directors supported where I was and voted it in. At the luncheon, the president's luncheon, I made the announcement that we were going to take this aboard. And it consisted of several things, one of course was that when taken aboard, if it was offered to us as it probably would be, we felt that it was necessary that it would be done. But in addition to that we had to publicize that we were doing such a product or that we were going to provide such a product. In other words there was an organization that knew how to use energy and how to use it efficiently and knew what they were talking about rather than emotional outburst. Along with that I proposed to establish an energy committee in all chapters and requested to establish a society energy committee and provide a regional representative on the energy conservation committee from each region and they would form, they would be the members of the committee but their job would be to go back to the region and assist the chapters in developing their program and of letting, the basis of that

program was letting the public know through the public press. It was no longer adequate for us to talk to ourselves as engineers which is what we had done for generations. It was a communication among ourselves. That's what ASHRAE was. It was an exchange of technical information, a learning process for engineers. It was not aimed at the general public but this was something where we had to aim at the general public.

M.K.

Now you were going out with this to a much broader public than just the ASHRAE membership and indeed a much broader public than ASHRAE had ever addressed before.

R.K.

That's exactly right. In order to accomplish this we needed to retain PR council, our public relations council and put the work at it. That was part of also what we were asking for the dues increase for because that cost us additional money. So with this I got a good reception at the president's luncheon from the general membership as well as those who were there from the board who had an exposure inside and a number of those in the general membership had been at the previous meeting with, meeting the night before I guess it was, with the, day before with the Bureau of Standards. So it was all compressed which I think is faster than ASHRAE usually works. Anyway we left Los Angeles where they, approval of the direction that we were moving by, it took from then until I think it was the latter part of March when NCBCS had their meeting which was in Salt Lake City. They invited me down and ASHRAE to take it over and do it. Of course in the mean time we really hadn't been sitting twiddling our thumbs waiting. We had set up our committees. We had our committee members lined up and we were ready to go. So as soon as we had it we began work on it. And by this time we had committee from IES then and from AIA and we all went to work on it. Everybody paid their own way to the meetings of their committees and it was entirely a volunteer effort and they met physically at least, they met, each committee met at least once a month and that meant bringing people from various parts of the country together on their own time.

M.K.

These meetings, were they in regions or was this just drawing from folks from a national geography?

R.K.

They were national meetings. This was a Standards Committee or a group of standards committees somewhat like the Handbook where you have an overall committee and you have a series of sub committees that have one chapter a piece to do or something to that, it was about the same kind of procedure we were using here. Some of the committees consisted of, I don't remember how many, but I think 10 or 12 people in each committee so it was a fairly significant group. And they worked together and they turned out a product. And our goal was to turn it out by the first of June. We were a little bit after the first of June but that came primarily from the fact that the American Institute of Architects advised that they were not happy with the process and that they felt that this should not be issued as a standard, as an ASHRAE standard. They would support it if it was issued as an ASHRAE principles of practice. I met with the head of their energy committee in Chicago, Leo Daly, and we discussed the subject. Essentially what it amounted to is if we proceed along the path that they suggested they would continue to support us. If we didn't they felt that they had no other alternative but to withdraw. There was no basis in which I could change the direction that we were going to downgrade what the standard was. It was too important and simple mandates from the Society was that it would be a standard. I

advised them of that and they indicated from this date that they were withdrawing. They had, the committee had gone a long ways towards writing the envelope chapter at that time and we simply set up an additional committee and finished it.

M.K.

Looking back now Rod, do you think that the absence of endorsement by the AIA had any effect, either positive or negative on the acceptance and use of this standard as it was published?

R.K.

I don't believe so. The standard was accepted when it came out and of course we went through consensus procedure after that for reviewing it before it was published in '75, this was mid '74 at this point in time. But we had it published by the end of my term at the end of January, or the end of June. So from March to June we turned out a major standard for the society and one that went out for, was published and issued in several thousand copies for a consensus review and we got back tremendous review and was worked on following that. What we set the basis for. Standards aren't usually done in a year or two years. It's usually many years.

M.K.

Well how many energy standards had we written prior to this?

R.K.

I don't know we had any.

M.K.

We didn't have any, did we.

R.K.

I know of none anyway.

M.K.

You were affecting not only the work that ASHRAE traditionally does but you were affecting other trades within the building.

R.K.

Drastically yes. We affected the envelope, the entire envelope of the building, what could be done with it and how it had to be done. We affected certainly the lighting and we affected also out of this, what we were demanding out of manufacturers and the level of improvement initially but on going from there.

M.K.

Did we mention the fact that we had the Illumination Society on board and endorsing this.

R.K.

They stayed with us. In fact today they're still a co-sponsor of the standard. I think it was a good relationship for them and for us. And I think it has been advantageous for both of us. The envelopes have changed radically because of this standard and so the architectural industry has been impacted. I don't know if I've ever heard anything very negative out of that even. Even though they had withdrawn as a co-sponsor.

M.K.

What do you think the basis of the reluctance on the part of AIA to continue to participate in this was founded upon? Was it because they didn't like the idea of their envelope being dictated to or adjusted in some way by someone other than themselves?

R.K.

I'm sure that had to be a portion of their concern. But it was a, really the whole subject of energy conservation or as I called it optimizing utilization of energy was a subject whose time had come and there was no way they were going to stop it or anyone else was going to stop it. It was going to happen. Either we had to do something about it or somebody else would have to fill the vacuum that was there. And it had to go ahead. I believe that the standard we turned out has been extremely successful. It did all the things I said it would do and more. My basic point during that year, and I went and talked to some of the congressional people and so forth, to try to drum up interest in energy conservation. And I was dumbfounded by the lack of interest I received. Their primary emphasis at the congressional level was the development of new sources of energy and expansion of the sources of energy, not in energy conservation. They had very little time or use for it. Sort of like, okay pat you on the head a little bit and tell you to run along little fellow. You had your opportunity to say something and now we want to take care of things. They didn't know how to take care of it. They were completely and totally off. What has really been effective has been energy, a careful use of energy. And conservation is perhaps the term but is not, it doesn't really represent it. Conservation may simply mean curtailing the use. We didn't curtail the use. We put buildings to work so they would still provide the comfort and the rest of conditions necessary for manufacturing plants, for office buildings, schools or anything else. And all we did with it was to use energy effectively. I said again, the optimization utilization. That was the whole purpose for. I told them at that time at the, I think it was 30% of the energy in the country was being used in buildings for heating, air conditioning, water heating, ventilation in industrial plants as well as other types of buildings and homes. And out of that 30% we ought to be able by simply using what we knew at that time be able to save 50% of that of 15% of the total energy the country was using. That was more than the shortfall that we had. It would have solved the entire problem. Now that meant that you had to go back and retro fit existing buildings as well as build new ones. After all simply building new buildings that used less energy per square foot didn't solve your problem at all because there were still new buildings and there was still new energy they were using. So it was only one leg of the three legged stool or whatever you call it, that was being accomplished. But it was the first leg and it was the most important one at that point in time to get it started. So we came out with a standard and that standard was processed with a, what turned out to be the basis of a consensus standard. There was no basis up to that time. We developed that as well. And that worked effectively. We had reviewers by the thousands and those reviews came in and each committee reviewed all the reviews that came in and responded to each one.

M.K.

Let me dwell on that just for a second because I was one of those young people out in the hills and bushes that wrote a response to that first standard. Wasn't the order of magnitude of the responses and input for that totally different than anything you had before?

R.K.

Yes. The usual process in the past was to get input from known experts in the field and that was about the extent of it. This was different. We were all experts in using energy because that's what our business is. And still is. That's what the people within ASHRAE do, is they utilize energy for comfort, for food preservation, for a whole lot of other things, but they’re using the energy. They're putting to use for the well being of the general public. So they were all experts in this and we needed and input from

all of them. So we made it as broadly available as possible. We did charge for copies of it for those people that we didn't have some particular reason to be aware of their needs. But we distributed it widely, many thousands. That's why we had to raise money in order to publish it. And so it was a, I think it was an effective process and it evolved. This wasn't all set up and advances to exactly how this would work. It evolved as we went along. By this time my year was over when that part was going on. But I still remained active in the process of this. And I had asked for as well, a standard to be started for energy utilization in existing buildings. And that's the 100 series. And the 100 series got started but it was a long time evolving from there.

M.K.

Now we're on the second edition of that standard now aren't we? And it has profited and grown in its coverage.

R.K.

Yeah, and it's more complex as well.

M.K.

Yes, it is.

R.K.

But we did have a basic one. We had the process of both a prescriptive standard and an alternative in which you would use an energy calculation in lieu of a prescriptive envelope for example, a prescriptive system. So it was in combination which allowed flexibility and yet provided a basis that was your standard. It took, going on from there in the future, it took a program by ASHRAE to help educate the public, well not the public, at least the energy design public in how to use it, in how to apply it, in how to understand it. But it was for somebody who wanted to sit down and take the time to understand it, it was useable from the first.

M.K.

Now Rod let's depart from your discussion of the energy standard for a little bit and talk about Rod Kirkwood and your walk and experiences in the ASHRAE committees and in the chairs.

R.K.

Well I had been working as a, back at the start of World War II, there was a draft and a fishbowl with numbers in it and so forth. I was working as a blueprint boy for a industry that was, a new concept, a defense industry during the summer while I was in college. And my number came up as number two out of the fishbowl so if I left the company I was with to go back to college, well I went directly into the service. If I stayed with them I got deferment because it was a defense industry. So I stayed and I became a draftsman, ultimately a designer. And I only had a couple of years of school at that time but it was enough for a background in it. So I ended up in a mechanical department in a defense contractor that was building navy bases.

M.K.

When your draft number is number two that's inspiration to study harder isn't it?

R.K.

Yeah it did. Anyway the, so I was interested at this time in heating ventilating and air conditioning as a result of that. Ultimately this industry was replaced by the Seabees so I did go in the service and I spent some three years in the service. And when I came out, or as I was getting towards the time coming out, I gone through officer candidate school and few other things, I had an opportunity to be stationed near

New York City so I went up to a meeting of ASHRAE in New York City. I guess that helped continue the interest. I went back, when I got out of service, I went back to Seattle and I took a job with one of the other design build firms that were doing both design and building. It was Austin Company. Worked for them for a while and then moved on from there. And I went back to school part time and such. But I then was in Seattle where I could join a chapter and I did. At that time it was called Pacific Northwest Chapter I guess it was. It was sort of a broad sweep of country that it covered but there weren't many chapters. And I was, I found it a useful source for learning and I continued to be a chapter member. Became the treasurer of the chapter and learned one of the duties of the chapter treasurer was to make up whatever deficits there was for that year.

M.K.

Oh is that right? That's another inspiration to be active.

R.K.

It was a good inspiration. I got busy and saw to it that we issued bills to everybody. And it was surprising how many people paid that had not paid for years. And so we ended up in a profit, or I should say a surplus. So I suggested on that basis since if I had had a deficit I would have had to make it up I would be able to take the surplus with me. Nobody agreed to that.

M.K.

Nobody agreed to that. Somehow I don't think they would.

R.K.

But anyway it was a few years later I ended up on the chapter board of officers. I had been treasurer and then I wasn't anything for a few years and then I came back into being a, I guess a vice president. I got elected, it just happened. So it turned out that I was the president, just been installed as president, when we had a regional meeting in Seattle. And it was an important regional meeting as far as I was concerned. It was the first one I ever really had any exposure to. So in our chapter our president was a representative at the regional meeting besides. I had a whole lot of exposure in a hurry. Tom White had been a regional chairman of the relatively new organization of ASHRAE, it was ASHVE, ASHAE sort of merged with ASRE and become ASHRAE and so the process what evolving. Tom White of San Francisco was a Regional Chairman for region X and instead of putting in one three year term he put in I guess four or five years at least before someone got around to finding a way to relieve him. And so the regional meeting was to make a recommendation to the society for who ought to consider for Regional Chairman and out of this process I got recommended and ultimately got elected to the board with only having been I think to one or two, I think really I'd never been to any other national meeting except the one that I had gone to originally in New York City.

M.K.

My goodness.

R.K.

So I was suddenly part of a bigger organization, more complex one then I really had expected. But Tom was very helpful in getting me started as regional chairman. Region X, which is what it was called in those days ran all the way from Tucson in the south to Vancouver BC on the north. And it was a lot of miles to travel and to make all those chapters once a year was quite a feat in itself.

M.K.

Well now did you get reimbursed for some of this travel?

R.K.

Well it paid for the air fare. Didn't get paid for any of the other expenses though. So those were mine to take care of. I talked the company into contributing most of those.

M.K.

And who were you working for at this time when you were regional director or regional chairman?

R.K.

John Grimm and Company at that time. Subsequently I became a president of it and a partner in the associated company and so forth but that was later. Had a lot of fun in Regions Central. And the board of directors, there were several of us that sort of learned fairly early on that Regions Central ran the society. The people running it just didn't understand that to begin with. We changed their mind on that. You know we had at that time 21 members on the Board of Directors. There were 10 regions and the chairman of the Regions Central who was the first vice president at that time and later became president elect but anyway with the 11 of us that were in that meeting we had the majority of the Board of Directors. So all we had to do was get a unanimous support in Regions Central and we went to the Board of Directors and we got what we wanted. And we did it time and again. And it changed the direction of society. We changed it that the Nominating Committee members were elected from the regions rather than being appointed. We changed many things. One of them was starting the process of the assistant regional chairman. Instead of calling him assistant we made him a regional-

M.K.

Vice chairman?

R.K.

No it wasn't a vice chairman. Regional membership committeeman as I recall. And then we went on to add that to research fundraising. And when I was president I added the energy conservation member and so on. So we developed a structure that went out into the grass roots.

M.K.

That was a subtle thing you did making the Nominating Committee come from the CRC rather than be appointed by the Board but that's been a very effective thing for ASHRAE. That was a very important part of ASHRAE.

R.K.

That was done very deliberately. Prior to that time we had to a fair extent a clique that was pretty much self supporting .

M.K.

Good ole boy network.

R.K.

Yeah, it was a network of that kind and I don't know that it was negative but it was what existed. And it had evolved over the years. But to broaden it, to make it strong, the only thing that makes ASHRAE strong is its broad membership. And we broadened it. We set out to do that. It was Jack Thompson and Stan Gilman and myself and a couple of others that set out with this as a, after we got to know each other, this as a determined policy. And we did it. And it worked. We did a lot of things like that. We took the ASHRAE and the ARI shows were in alternate years and they were in competition with each other and they were independent shows. We took those, we had a problem. We had a couple of problems. One year the ARI show was going to be in the late fall and the ASHRAE show was going to be

in January. They were separate years but they were only a couple months apart. And that wasn't very satisfactory to anybody. That was an example of the kind of thing that happened. So Stan Gilman and I were picked as a committee and we went down and talked to ARI about it. And we convinced them it was much better if we merged the show together and with that merger we worked out with an arrangement with them that they would still get a portion of the return but we would get the lions share. And it's gone that way ever since and its worked well. Never had the problem anymore. They were having a light attendance at their show because they didn't have an ASHRAE meeting along with it and the combination made it a much better show. And we also had the agreement that every other year at that time either Seattle, I mean either Chicago or, excuse me. Every fourth year would be Chicago and half way between that would be a cycle with New York. New York didn't work out well because the coliseum in New York was only available if you signed up for every year so we had to work out something different than that which we did. But the big show was every second year, the show in-between was one that was somewhat smaller and we could move it around the country and bring it out to the people throughout much of the rest of the country. Because at that time there wasn't much a facility in many places big enough for the big show. But we did this still as an ASHRAE/ARI show. It worked well. It brought something out to the whole country that wouldn't have been there otherwise. And yet of course we had the summer meeting where we didn't have a show so that could go into places that didn't have to have an exhibition hall at all. That was planned process. It didn't happen. It was deliberately planned and we worked it and it worked well.

M.K.

I think ASHRAE has done a very, very good job of getting these meetings out to the people in the chapters and in fact I look forward to become international in scope. I bet we're going to see some water under these airplanes brining people to these meetings.

R.K.

I think that's true.

M.K.

Let's talk about people now for a moment. Do you have any stories about the people that you'd like to share with us?

R.K.

Well I think this is sort of a broad people story. There's innumerable individuals that could be talked about but I think there is a broad people story and that it I never found anybody in ASHRAE that wasn't a willing worker. All you had to do was touch the right button and they'd bust their behind for you. They really are, just like the crew that went to work, hundreds of people that went to work on Standard 90. As I said before at their own expense. It's not that they were really paying to take aboard extra effort and they worked extremely hard. The kind of thing we did, if you tried to pay somebody, some organization to provide the caliber of people that we had working on it and paid them to write that standard, I don't think they could have done it in the length of time we had available, as a paid effort for a consulting firm of some type. These people did yeoman's work and they did it with hard work but they, building enthusiasm and belief in the whole thing it was, it's hard even thinking backwards to it to relay how you could get that kind of crew working under those kinds of circumstances.

M.K.

That's another good example of a situation within ASHRAE that shouldn't work but so many people took it upon themselves to contribute to the formulation of these standards. The energy standard has been really a contribution to the whole building industry and the national energy optimization.

R.K.

It's more than that. It's an international activity with regard it's a national standard it's still certainly a full international basis for energy conservation throughout the world. It has been very effective since. But it was that kind of thing that said what I did, never found anybody that wasn't a willing worker. Some of them were working at perhaps somewhat different agenda than others. But you just had to hit the right button and theirs fit in with everything else and there's certain amount of questions that have to be asked and somebody might not otherwise. And so they were all contributing and contributing effectively. Jack Tumilty was the chairman of this thing and he put in untold hours of effort and there were many others just like that. Just unlimited effort.

M.K.

All those contributions are relatively small ones, not big contributors any one of them. It's totally unlike any other fundraising activity. It's a whole bunch of small contributors and I think you're very, very right. It has a very beneficial effect on each chapter in the community that each chapter lives in. Rod, if you were going to give advice to a young man who had a number two number in the draft and was working at a drawing board in an engineering firm, what kind of thing would you say to him?

R.K.

Well I guess what worked out for me was perhaps accidental but it worked out well. I would think that so long as he can continue to learn where he's at and contribute to what is going on in the defense effort he had a positive part of it. If we had to have him in a, in the military when the time came well he'd have to go that's all. You come back from it and you pick up where you left off.

M.K.

I meant more what advice would you give to people about how they would relate to ASHRAE and maybe get started within ASHRAE

R.K.

I think that's an important aspect. We can be wrapped up in our social activities, our family activities, our basis which we are earning our income and all that's necessary but in order to broaden beyond that you need to understand your industry and contribute to the industry. You're taking out of the industry, you need to put something back to help the industry grow, to improve it for yourself but to improve it for what the generations to come as well. And I think that's what ASHRAE can do for you. I think it's, there's a high level of satisfaction out of it. The pay isn't very good but the satisfaction if terrific.

M.K.

The volunteer opportunities are enormous.

R.K.

Yeah, there are lots of those.

M.K.

Alright, as we draw to a close are there any other observations or comments that you'd like to make?

R.K.

Well we, I guess the biggest concern would be we not become complacent, that we've got a lot of things yet to do. And it will keep on happening out there waiting for somebody to grasp the opportunity and

do something with it. Either you rise to them and take care of them or somebody else will step in and do it and you will have lost the opportunity. Maybe don't have to put the effort forth then if someone else is doing it but you've lost the opportunity and you've lost the opportunity to see it get done right. And I think from that standpoint that we need to be moving ahead just as intensely today as we were back in the days of putting out ASHRAE Standard 90. Those are things that we can do. The base we have to work from is much broader. Our financial position was a whole lot different than it was then. The total annual budget at the time I was president including the research was about 2 million dollars and I think we're up to many times that now.

M.K.

Yes. It's on the order of 13 to 14 million now.

R.K.

Well, see that's seven times and that's, we're now talking 20 years ago so that's pretty good growth in 20 years. Just like the growth of our Society. We're still growing and we're growing in spite of the current, or what has just been a recession. And most societies are not only not growing, they're shrinking. So we got something going but we could easily get that reversed on us if we don't keep a high level of interest, a high level of doing what the membership needs.

M.K.

What kind of things would you hope to see ASHRAE focus on or improve in the coming years?

R.K.

Well I think that the subject of energy is still, what our basic effort is, is utilizing energy. I think that still needs lots of attention not only for the effective utilization of it but in conserving our resources but also in minimizing the impact on the environment. Every BTU that we convert into energy that ends up being in the atmosphere somewhere is an impact on the environment. And from that standpoint we need to utilize energy in the most efficient way possible and that reduces our need for energy but that also reduces the pollution aspect of it. I think that's really our principle, we shouldn't lose sight of the fact that that's the basis for our whole industry.

M.K.

In there anything you'd like to say now as we close or final comment?

R.K.

I think ASHRAE's a unique organization. It has, it's special, partially because it involves the design profession but it also involves all the other related activities. It's design, its manufacturers, its contractors, its sales representatives. It's the whole industry. It isn't an isolated ivory tower design organization. And I think that's what makes it very special. It's good. It has a lot more vitality, a lot more life than it would have otherwise. And that's very important to the members. I think it's also important to its future and I think it has a great future.

M.K.

Well Rod I thank you for joining us this afternoon and being part of these Leadership Recalled interviews and enjoy your stay in Baltimore and we have certainly enjoyed this opportunity to talk to you.

R.K.

Thank you.