NASA ORAL HISTORY PROJECT Oral History Transcript

Richard H. Truly Interviewed by Rebecca Wright Golden, Colorado – 16 June 2003

WRIGHT: This oral history with Richard Truly is being conducted by Rebecca Wright for the NASA Oral History Project at the National Renewable Energy Laboratory in Golden, Colorado, where Admiral Truly serves as the director. Today is June 16th, 2003.

We thank you for taking time to participate with our project.

TRULY: Thank you for including me.

WRIGHT: We'd like to start by you sharing with us how your interest in aviation began.

TRULY: Well, of course, when I was a kid, I was like all other kids. I was interested in flying, but a hundred other things, built model airplanes, that kind of thing, but I never really intended to be a pilot. It just never occurred to me that that would be a possibility.

When I eventually went to college at Georgia Tech [Georgia Institute of Technology, Atlanta, Georgia], I knew that I wanted to be an engineer, and I had a Navy ROTC [Reserve Officer Training Corps] scholarship to Tech. When I had to select an engineering degree path, aeronautical engineering looked intriguing to me, and I selected AE. Still didn't want to be a pilot. It wasn't that I didn't want to be, it just never [really occurred to me] I was going to be an engineer.

My [first] midshipman summer cruise, between my freshmen and sophomore years, was at sea aboard [a destroyer escort], the USS *Fred T. Berry* (DDE-858). But the second cruise was not an at-sea cruise, but they called it a cruise [anyway]. It was a combination naval aviation indoctrination down in Corpus Christi [Texas] and [then] a Marine Corps indoctrination up at Little Creek, Virginia. When I went through that summer and went down to Corpus Christi, [it was] the first time I was around [naval] aviation. They took us on a couple of flights in some kind of [jet] trainer, and the Blue Angels [put on an air show]. At the time they were flying [the Grumman] F-11F ["Tiger"]. And I was really intrigued. I mean, I really thought, "Man, this is really great." I never had thought of [an aviation career], really, before.

So when I got back to Georgia Tech, I had thought about it somewhat. I realized that [because] I had a Navy scholarship; my commitment, because of the scholarship, to the Navy was three years. ... But for [only] one additional year of commitment to the Navy, I could apply to flight school. So I figured, I would do that.

I went back to the Navy ROTC unit, and I signed up for a track to be a naval aviator. [I graduated from] Georgia Tech at the end of the four years; I got my degree in aeronautical engineering but also in that last year [I] took all the physicals for flight school and so forth, and I passed them all. So the Navy [issued] me a set of orders to flight school at Pensacola [Florida]. So that's how I got into it. It wasn't that I wanted to all my life. It was a career choice. I'd never intended to stay in the Navy. I intended to go get my wings, fly for the four years, and then I was going to get out of the Navy and go to graduate school. So that's how I ended up starting my flying career.

WRIGHT: How did those plans shift where that didn't happen and you ended up-

TRULY: Well, I went through flight school, as I said, directly after college, and got my wings after about [sixteen] months. I got a set of orders to a Navy fighter squadron, VF-33, which was flying off the USS *Intrepid* and home-based in Naval Air Station Oceana, Virginia. ... First, I went to Jacksonville [Florida], trained in the airplane. It was [the Chance Vought] F-8 Crusader. Then I [reported] to VF-33, and I proceeded through that first tour.

After that first tour, if you added up the time that I was in flight school, plus that first tour, that was when I was going to get out of the Navy. ... [After one year in the squadron], our air group, including VF-33, was reassigned from the USS *Intrepid* to the USS *Enterprise*. So toward the tail end of that fighter squadron tour, I was aboard *Enterprise*. The skipper of the squadron, [commander] Larry Ned Smith, who's now dead, came to me and suggested that I apply to test pilot school, which I had never thought about. Every point in my career, I just kind of backed into [the opportunities].

At any rate, the skipper came to me and suggested that I apply for test pilot school. So I thought about it, thinking that if I got selected I would be sent to [Naval Air Station] Patuxent River, Maryland, where the Navy school is. So I decided to do that, and I was at sea [so I] didn't get a chance to talk to my wife, Cody. I applied to test pilot school and then later told her about it, which did not make a big hit, because she had made her plans just like I had for me to get out of the Navy and go get a graduate engineering degree. ...

At any rate, I applied to Navy test pilot training, and I figured that if I didn't get selected, which I didn't figure I would, then I'd get out of the Navy. If I did get selected, I'd stay in the Navy, because I didn't want to just continually make decisions about will I get out, will I stay in. So that was it. I wrote off a letter to the Navy, applied to test pilot school, and lo and behold, I got selected to go to test pilot school. But the Navy didn't send me to Patuxent River. Unbeknownst to me, the Navy had just started an exchange program with the Air Force out at Edwards Air Force Base [California], and so I got a set of orders not to Naval Air Station Patuxent River, but to Edwards Air Force Base, to a school that was called the U.S. Air Force Aerospace Research Pilot School.

So I told Cody that we were staying in the Navy and moving, and going to the Air Force school out at Edwards, and we did that. When I checked out of VF-33 at Oceana, it was in November of 1963. I remember [President John F.] Kennedy got assassinated that month, and when we were packing out of our house, the black-and-white TV was on and it was Kennedy's funeral. I was a brand-new Navy lieutenant.

... Cody and I packed up the family, and we [started driving] west. I had to go through Brooks Air Force Base [Texas] to take a long physical that was required by the test pilot school. We arrived at Edwards over the Christmas season, and I started into the test pilot training in January of that coming year. I was in class 64A. The commandant of the school was [Colonel] Chuck [Charles E.] Yeager.

At that point, I had something over a thousand hours of flying time and about three hundred-plus carrier landings. Another person who ended up becoming a dear friend, another Navy lieutenant, by the name of Jack [John L.] Finley, was in that class, and most of my classmates were Air Force. There was a Royal Canadian Air Force pilot, two Navy, the rest Air Force, except for there were also two NASA [test] pilots. One of them was Fred [W.] Haise, who later flew Apollo 13, and [the other was] Don [Donald L.] Mallick. Fred and Don were test pilots up at the NASA [Dryden] Flight Research Center at Edwards [California].

WRIGHT: You were part of that school, and how did you learn about the Manned Orbiting Laboratory Program, and how did you become part of that program?

TRULY: The Air Force had a [space] program called Dyna-Soar, and as a matter of fact, during that [westward] trip, after I had left Oceana and was driving to Edwards, the Air Force announced that the Dyna-Soar Program was being cancelled. But at the time same, they announced they were going to start a new space program, which was going to be an orbital space station, if you will, called the Manned Orbiting Laboratory, or MOL. That didn't [interest] me, since I [felt] that I was not qualified to be an astronaut. I had never thought about it. The Mercury guys had been selected to NASA, but, I never even dreamed that I would be able to ever do something like that.

So we started into that test pilot training during [1964], and all of us in the school knew that MOL was coming and Dyna-Soar had been cancelled. But I was working hard [just] to get through the test pilot school, and I wasn't thinking about flying in space. Well, it turned out that unbeknownst to all the students in the school, Chuck Yeager and [an officer] who worked for him named "Buck" Buchanan, who was an Air Force lieutenant colonel at the time, later made colonel, I believe, had gone to Air Force [Headquarters in Washington, D.C.] and had convinced the Air Force that the first group of MOL astronauts to be selected had to be graduates of the Aerospace Research Pilot School that I was attending.

The first six months of [the curriculum] was test pilot school and the last six months of it was more about space, where you learned about orbital mechanics and spacecraft systems and digital computers and all of that. You've got to remember this was 1964, so, a lot of this really [was] cutting-edge stuff.

Well, as we got about two-thirds or three-quarters of the way through 1964, through my test pilot training, suddenly we realized that [the Air Force] had limited the number of [MOL] candidates just to graduates of this school, and they [further] had decided to include our class, even though wouldn't graduate until December of that year. [The game had changed.]

The other thing that they didn't tell anybody was that without ever asking for applications, Yeager convinced the Air Force that the graduates of the school, of which there were only eighty-five including our class, they just figured all eighty-five would want to do it, and so they started a selection without anybody knowing it. The candidates to be eventually selected, in other words, the candidates to be selected in that first MOL class, were [from] the eighty-five graduates of the school.

Now, finally, I realized that our names were in this selection, but it still didn't [register that I had a chance]. I mean, some of the world's most famous test pilots had already graduated from the school. They were setting world records right and left in the X-15 and other airplanes at the time. So, again, it didn't occur to me that I had any chance of being selected. But suddenly, I did realize that my name was in that pot.

Meanwhile, down at NASA, NASA was selecting more and more crews, and a lot of people that were in the test pilot school made the choice either to not be—you know, "I only want to go to NASA," or, you know, "I'll do anything." A lot of them [later flew] to the Moon, you know. [Many] were [from] that same group of people that were graduates of this school.

Well, come November, I think, or so of 1964, Yeager and Buchanan flew to Washington [D.C.], and they were completing their [secret] selection and they had gone through everybody's

records. There was a selection board. They came back and, I'll be damned, I got selected, and so did Finley. So there were originally [nine] people that were identified for the MOL Program, but they weren't going to announce the selection until the Air Force formally announced the beginning of the program, because they needed money from Congress. There were [seven] Air Force and two Navy. [I was the youngest.]

Well [in December], I graduated from test pilot school, and the Air Force had to hang on to Finley and me. They didn't want to send us back to the Navy, because they had us there. So they decided to keep us at Edwards, and the Navy agreed to this, while the Air Force was waiting to announce the MOL Program. They kept us at Edwards as instructors in the Aerospace Research Pilot School. So in 1965, I became a test pilot instructor.

During that next year, one of the [nine] crewmen had some sort of a medical problem or something [and dropped off the list], and so on November 12th of 1965, there was [an Air Force] press conference [in Los Angeles, California]. I remember that date well, because it was my twenty-eighth birthday. ... They formally announced the first MOL crew, or group of astronaut selection, and it was [eight] people. It was the remaining [six] Air Force, less the one that had been taken out of consideration, [plus] Jack Finley and me. ... [In the summer of 1966, Michael J. Adams left the MOL program to return to Edwards and fly the X-15. That left seven of us, and we jokingly referred to ourselves as "the magnificent seven" after the movie. Unfortunately, Mike Adams was killed in an X-15 accident in November 1967.]

So suddenly I was in an astronaut program, and we worked like the devil from that day until that program was eventually cancelled in 1969 by President [Richard M.] Nixon. It was a classified program. It still remains classified. But we eventually moved down to Los Angeles [California]. The MOL Program office was located in El Segundo [California]. So I was an MOL astronaut from that press conference until the day the program was cancelled, which all of us in the program still refer to as Black Tuesday. It was Tuesday, the tenth of June 1969.

During that period, we'd made many trips to NASA. The Gemini Program was [flying]. Eventually Gemini was over, and Apollo was coming. So they would take us on tours of the Cape [Canaveral, Florida] and tours of [Marshall Space Flight Center] Huntsville [Alabama] and tours down at the Manned [Spacecraft] Center in Houston [Texas], which was later named for [President Lyndon B.] Johnson. So I got to know all the NASA [astronauts]. I already knew many of them, but during that period I got to know just about all of the NASA astronauts during the sixties. We would go to launches. But we were in a different program, which was a military program. So I never filled out an application to be on MOL.

Well, let me tell you one other thing. After that first MOL selection, a lot of other [pilots] in the Air Force really complained because they didn't get a chance to be selected. Some of them had gone to graduate school and gotten doctorates and this and that. So the Air Force changed the rules after that first selection, and then they had a formal selection where you had to apply. Then all the applications would come in, and you would be considered. They'd do a selection. And so there were a couple [more] MOL groups of [pilots] that [joined] the MOL flight crew during that period.

Well, MOL was cancelled [on June 10th] of 1969, and, of course, Apollo 11 was coming up in July of that year. So it was a very exciting time in the space program. All the NASA people were happy because they were getting ready to go to the Moon, and the MOL people were just crushed. I didn't know what was going to happen to my career. I went to the Pentagon. The Navy was really good, though, and they offered to assign me to any airplane I wanted to fly in the Navy and go to Vietnam. [During the same time], there was a discussion between NASA and the Air Force about what to do with the MOL crew. At the time of the [MOL] cancellation, there were fourteen MOL flight [crewmen]. "Deke" [Donald K.] Slayton and the people down at [the NASA Manned Spacecraft Center] didn't want us. They didn't want any more astronauts, because they already had too many. They've always had too many, I think. But they had all these people in the Astronaut Office. They were in the process of just starting Apollo. They were also in the process of winding down the program and looking at cancellations of Apollo 18 and Apollo 19. So, Deke didn't want us.

Nevertheless, [at NASA Headquarters in Washington, D.C.], George [E.] Mueller, who you probably have an oral review, and he may have covered this same thing. He was head of the Office of Space Flight, and he decided that they should take some of the MOL crew, and the agreement that was cut [with the Air Force] was that they would reassign the seven youngest MOL crewmen out of the fourteen to NASA. Well, it turned out that of the original MOL crew that had been announced at that first press conference in 1965, I was the only one that was young enough [in 1969] to still be in the youngest seven of the MOL fourteen. So I never filled out an application [to NASA]. So I'm the only person who has ever flown in space that never applied. [Laughs]

WRIGHT: That's quite a character reference there.

TRULY: [At] any rate, Cody and I picked up, [packed the family, and] moved to Houston, which was very traumatic. ... The fact [that NASA] didn't want us didn't have anything to do with personalities or anything. They just had too many people. So any rate, they took us. We drove

from Los Angeles to Houston in August of 1969, and the family's heels were dug in all the way across the country. [Finally] arrived in Houston. [Our dog even died on the trip!] God, it was typical Houston awful summer, humidity was terrible.

I arrived in the Astronaut Office in between Apollo 11 and Apollo 12. So Neil [A. Armstrong] and his crew had flown to the Moon, and Pete [Charles] Conrad and his crew were in training. That's how I got to NASA.

WRIGHT: Before we get into those days, can you share what you were able to share maybe with your family and friends when you were part of the MOL? What were you able to tell people that you were doing?

TRULY: Well, the description of what the program was was unclassified. It was a [two man 30day mission, a] Gemini-[B] spacecraft attached to a sixty-foot cylindrical station, thirty feet of it closest to the Gemini module was called a habitation module, or hab module. Then the [aft] thirty feet was the mission equipment, [called the mission module].

However, what that mission was on orbit was classified and still remains classified. So we didn't tell anybody anything. NASA has always invited the public to know everything about [NASA programs] that's possible to know. In the Air Force, that press conference we had the day we were announced was the last press conference that the MOL flight crew ever had, and we were not allowed to even talk to the media. It was a classified program. So I really couldn't go home with the family and tell them much about it, and I wish they'd declassify the damned thing so I could. But I can't change that. WRIGHT: What were some of your first duties and responsibilities once you arrived as part of the Astronaut Office?

TRULY: When I got down there, they decided to take the better part of a year so we could learn about NASA—we already knew a lot. I mean, we already had trained to fly. We knew all about spacecraft systems and all that. But on the other hand, we did not know specifically about the Saturn booster or the [Apollo] command module and the lunar module and all of that. So we went to school and went to training briefings about the NASA hardware.

Skylab was also coming along. We were beginning to fly the remaining flights of the Apollo Program, but everybody knew that Apollo was going to be cut short. Somewhere in there, Apollo 18, 19, and, I think, 20, which were planned, were all cancelled. So the Astronaut Office was all tied up with the Apollo missions, as they should be. In those days, you had a prime crew, a backup crew, and a support crew devoted to every mission. Dave [David R.] Scott asked me to be on the support crew for Apollo 15, and I was thinking about that. At the same time, Walt [Walter] Cunningham was leading the part of the office that was planning Skylab, [and he asked me to join Skylab].

I just decided [against] hanging onto Apollo, even though it was a magic mission, it will never be repeated, but I didn't see any future in me being on the support crew for Apollo 15 or any other Apollo mission, and I did think I could bring a lot to the Skylab [effort]. So I elected [to turn] down the opportunity to be Apollo 15 support crew, and I joined Walt and the team of people in the office that were planning Skylab, which was getting essentially no notice at the time because Apollo was still going on. I was in the [Astronaut] Office during all the Apollo missions, except for Apollo 11, and I learned about the command module and I knew all the hardware and all that stuff, but I was never directly on any of the support crews or backup crews for Apollo. I devoted myself entirely to working towards Skylab. That was a full-time job, it really was. It was a totally different mission, different hardware, except for the command module. So I got into that. The job that I was given was the Orbital workshop which was being built by McDonnell Douglas in Huntington Beach [California].

I should back up for a minute. Back when I was on the MOL Program, I was working on that classified part of the mission, and that was done in King of Prussia, Pennsylvania, by General Electric. So when I lived in Los Angeles, I was having to travel to King of Prussia, Pennsylvania, to work on the space program, and Huntington Beach was right down the road. So then when I moved to Houston, then my job was out at Huntington Beach, and so now I'm living in Houston working on the Skylab workshop, which was in Huntington Beach. The other parts of the Skylab were in different parts of the country, being built by different contractors. One was in St. Louis [Missouri], but they were all over the country.

So most of the MOL crew was assigned to Skylab—me, Bob [Robert L.] Crippen, Bob [Robert F.] Overmyer, who's now dead, and several others. So we were really workhorses in bringing Skylab to its launch. All of those different parts of the Skylab were having problems in the factory. [NASA] had to get them out of the factory and send them all down to the Cape so they could eventually be assembled.

I was working the Skylab mission, and as we got closer to flight, [NASA] decided who was going to fly [the three] Skylab [missions]. I foolishly thought that maybe I would actually get to fly on Skylab, but I really didn't account for the fact that [for] Deke and Al [Alan B.]

Shepard—the way it worked was, you were in a line. There were a lot of people in line ahead of me, and so even though [the MOL crew] imagined that maybe we'd get assigned [to fly] Skylab, it wasn't to be.

So they announced the crews, and Pete [Conrad] was going to command the first Skylab crew, and then Al [Alan L.] Bean the second and Jerry [Gerald P.] Carr the third. By this time we had worked on Skylab, we knew all about it, and so as we got closer to flight and the hardware had [been shipped] to the Cape, we began training in the [Mission] Control Center. We were going to be the CapComs [Capsule Communicators] on Skylab.

Well, I got assigned the job of being the ascent, rendezvous, and entry CapCom on the first mission, but I had never worked on [the command module], even though I had [gone through] those early briefings on the command module. ... I knew all about the workshop, but I didn't know much about the command module, so I had to learn that. So my first experience in actual flight, not counting the training, was in the ascent and rendezvous for Skylab.

I was on [Flight Director] Phil [Philip C.] Shaffer's team, "the Purple Gang. ... If you remember [when] the workshop was put into orbit, the meteorite shield fell off, [and] one of the solar wings was torn off. I was prepared the very next day to be the CapCom for Pete Conrad, [Joseph P. Kerwin, and Paul J. Weitz] going to the workshop, and I was sitting in the CapCom seat for that unmanned launch when the meteorite shield fell off.

Well, of course, you know what happened. NASA had to figure out what the heck to do. They thought they were going to lose the mission. They eventually did all the workarounds, and we hustled. There was a launch opportunity for Pete and his crew, if I remember right, every five days. They still were working so hard to figure out how to save the mission, that [we] missed [the first five-day launch] opportunity. So ten days later, they actually launched. I was the CapCom for the launch and the rendezvous. At the end of the rendezvous, [the crew was] supposed to just dock, and they couldn't dock. They had a problem with the docking hardware, and so I [and] the Purple Gang and I could not get off the console because since they couldn't dock, they had to back away and essentially re-rendezvous, and we were the only rendezvous flight control team. So I think I was plugged [into the console] for twenty hours or so. I mean, the record would show. But the team behind us couldn't relieve us because our team [was] the only one that knew the rendezvous.

Well, finally, late, late, late that night, we made one last [docking] attempt, and if that had failed, we were going to park the command module several miles behind the workshop, and think about it. And sure enough, by golly, they docked. So then we had to stay on console longer, because we were the ones that, once they started opening hatches and stuff, [only the purple gang] had trained for all of that. So we finally got off the console, and I don't remember how many hours it was.

At any rate, the Skylab mission flew, and I was the entry CapCom for the reentry of Pete Conrad's crew. But then after that first mission, somebody decided that they wanted somebody else to do the reentry, and that was good, because it allowed somebody else to get that reentry training and experience. Bob Crippen became the entry CapCom. So in the second mission, "Beano's" mission, and Jerry's mission, [the third mission], I was the ascent and rendezvous CapCom, but "Crip" was the entry CapCom.

WRIGHT: Well, our time is almost up today.

TRULY: It passes in a hurry, doesn't it?

WRIGHT: Yes, sir, it does. And there's so much more to talk about Skylab, maybe the next time that we can sit down, we could pick it up from here. Would that be okay?

TRULY: Sure, I'd be glad to. Yes.

WRIGHT: All right.

[End of interview]