

THE RESTORATION OF CHARLIE ECHO

Arriving in Tyler, Texas for depositions and hearings, my client and I walked past an open hangar at Johnson Aviation. Sitting there, modestly, was a 1968 Aero Commander 500S “Shrike”. This type aircraft was made famous by the legendary Bob Hoover in his multi-engine physics-defying aerobatic routine that thrilled thousands of spectators over the years. Her original registration was N4816E, assigned when she received her original certificate of airworthiness on July 24, 1968.¹ If you have any question as to why we were destined to re-register the Aero Commander, try saying “16E” several times quickly - I couldn’t stand the thought of laboring with her original call sign over the years, thinking that I had better things to do than continuously untie my tongue while in flight.

My law partner Drew Coats and I had been having some *very* preliminary discussions about potential firm aircraft. I had an interest in Aero Commanders because I had flown a 500B in the mid 70’s when I first got involved in commercial flight operations, and the initial investment in many of the Commander models could be quite reasonable. Although N4816E was airworthy, she definitely needed some serious TLC. The “before” photographs, unusually, give her too much justice, and there were many areas that required attention. For example, exterior touch-up paint had been, ahem, “applied” over the existing paint scheme. We were unable to determine if a spray can or a roller was used, but the result did not quite match the balance of the paint scheme, and the runs and drips doubtless cost valuable cruise speed. She still had the original “eyebrow” upper instrument panel, containing “Gables” head radios (which would only channelize one-half of the required communication frequencies), a transponder control head where the remote box had long been removed from the aircraft, and a “coffee grinder” ADF control head where the remote radio had also departed the aircraft long ago. Thankfully, her previous owner had installed a Garmin 430 in the center radio panel that rectified many of the problems with the original radios.² That was the good news; the bad news was that the replacement transponder and other instruments, such as the DME, were stuck into the panel more or less wherever they would fit. For instance, although well equipped with Insight engine analyzers, they were mounted below the center pedestal, which was not exactly in a “normal” instrument scan. This was, however, a very common problem with Aero Commander instrument panels when avionics changes take place over the years without a wholesale instrument panel replacement, which we figured was in the Commander’s future as well.

¹My lovely wife Penny and I both have our birthdays in July, we were engaged at the Lawyer Pilots Bar Association (“LPBA”) meeting in Breezy Point, Minnesota during July, 2001, and we were married at the LPBA meeting in Whistler, British Columbia during July, 2002, so this is yet another annual family event that takes place in July.

²The previous owner had owned and operated the Commander since 1985. Unfortunately, he passed away shortly before I first saw the aircraft in Tyler. His daughter decided to sell the airplane, and we remain sincerely appreciative of the tenure the Commander had with them, and the fortuity of finding their airplane and becoming its next owner.

Chip McClure and Ron Farrish listed the aircraft for sale, and, once our hearings and depositions were over, Chip stood by patiently as my client and I asked a multitude of questions about the Commander. Brief negotiations ensued, and because of Chip and Ron's good relationship with the seller, and their understanding of the Aero Commander market, we quickly arrived at a mutually acceptable price.³ The aircraft had over eight thousand flight hours, and the engines had 1450 out of 1600 hours between overhaul. Doing precisely what I counsel my clients never to do, I bought the airplane on the strength of a logbook review, bolstered somewhat by what I am sure was a thoroughly tiring telephonic interview with Johnson Aviation's mechanics, who had been maintaining the airplane for many years.

Of the many Aero Commander designations and models, the "Shrike" was high on our short list. Not only was it the last twin-engine Aero Commander model manufactured, Aero Commander made more Shrikes than any other model. Plus, it was non-pressurized, and had no turbo-chargers or geared engines, the types of high maintenance items that could escalate maintenance to an unacceptable level for a small law firm.⁴ However, the Shrike was known to be a marvelous instrument platform, and had great redundancy for night and instrument flight operations, including two complete flight instrument groups, and multiple sources of electrical, vacuum, and hydraulic power. This Commander had all of her original logbooks, no major damage history, no history of corrosion, and a three year spar inspection interval, which is the best interval you can get without replacing the spar cap.

We organized Buckeye Aviation⁵, arranged financing, completed the sale, and soon the appointed day came to retrieve the Commander from Tyler. Ron Farrish bravely occupied the right seat to accomplish my extreme need to become current. I had not flown a multi-engine reciprocating-engine aircraft for at least twenty-six years, and nothing at all in the previous year and one-half. Sandwiched in between those two dates I had logged over twenty years flying Cessna Citations, Learjets, and Gulfstreams. I had also obtained a type rating in the Boeing 737 in 1996, but because I was still current in turbo-jets, the entire rating was obtained in the FlightSafety 737 Simulator at Hobby Airport. It was August, 2002, it was hot, hot, and hot, in Tyler, and clearly the most important lesson was on how to get the fuel-injected engines running. The first somewhat cold starts were not much of a problem, and soon we had completed three circuits around Tyler Pounds Field and three landings - presto, I was current for the return flight to Houston. I still have an image of Ron and Chip laughing hysterically as they turned me loose for the first hot starts of any reciprocating, fuel-injected engine in decades. The Commander eventually started, probably out of sympathy, and the return flight to Houston was as delightful as it was uneventful.

³Chip continues to lament that August, 2002, was just about the bottom of the Aero Commander market, noting that prices began gravitating upward immediately after we bought the Commander.

⁴Geared engines alone almost double the cost of an engine overhaul.

⁵I was born and raised in Columbus, Ohio, and graduated from Ohio State in 1975. As a life long Ohio State Buckeye fan and an alumnus, this name for the company was pre-ordained, as well as the scarlet and gray Buckeye décor of the Commander and its hangar at David Wayne Hooks Airport.

So, now that we own her, what do we do with her? It wasn't like we were going to place her into service right away in support of the law firm; we didn't even have a place to keep her. We did the obligatory introductory flights, primarily as an excuse to become more familiar with the Commander. During this time we also had an ongoing dialogue with Gary Gadberry, at Aircenter, Inc., about upgrades the aircraft needed. Aircenter had an incredible array of Supplemental Type Certificates ("STCs") available to turn our 1968 500S into what appeared to be one of the last of her kind to roll off of the assembly line. Most importantly, there was a freon air conditioning system available. If you are going to use a light twin for business purposes in Texas, you need air conditioning unless there are full shower facilities between the airport and your destination - not likely. It was hard to resist the Commander candy store, and we eventually signed up for almost every Aircenter STC available: Aircenter Freon Air Conditioner, 90 Amp Alternators, Flap Gap Seals, ½" Thick tinted cabin windows, Frameless Crew Vent Windows, Exhaust Deflectors, Square Rudder Cap, Stinger Tail Cone, Winglets, Eyebrow Windows, Split Nose Cowlings, Nacelle Pulsating Recognition/Landing Lights⁶, and High Torque Starters.⁷ Installing the air conditioner resulted in almost no weight gain, as the weight was offset by the alternator replacement, which also put the weight where it could be used - in the tail cone instead of on the engines, moving the center of gravity aft. The eyebrow windows and the frameless vent windows not only updated the Shrike's appearance to that of a later model, but were also essential safety improvements, eliminating blind spots from the heavy window frame originally used for the cockpit side windows, and correcting an inability to look into turns from either side, resulting in an aircraft that had reasonable visibility to begin with to one with unsurpassed visibility from the cockpit. Although the winglets look really spiffy, they are mostly for show, but the flap gap seals really helped, and the net result is a Shrike that cruises 7-8 knots faster than flight manual speed. Returning our now patchwork-quilt but highly upgraded Aero Commander to Texas, we had selected Aerosmith Aviation, in Longview, for the full exterior strip and paint. It is far better to be lucky than good, and in this case the trip to Longview demonstrated how lucky we were. Not only did Aerosmith provide the Commander a world class paint job, but the stripping process also revealed the pristine condition the airframe continued to be in after all the years; it could have still been on the assembly line in 1968 it was in such superb condition. Surveying our interior, the upper half of which had been replaced during the Aircenter modifications, Wayne Smith and his crew even offered to donate certified and burn-tested interior materials, including carpet and side panels, if we paid for the installation labor, which we happily agreed to. Although one of the windshields had already been replaced, Aerosmith removed both of them in order to repair what had become over the years the most abused windshield surround I had ever seen, with layer upon layer of that magic substance "bondo" that had predictably cracked in

⁶The Commander looks like a UFO at night, with the factory landing lights, the pulsating recognition lights, strobes at three corners and upper and lower rotating beacons. There is no such thing as a night landing with everything turned on for arrival.

⁷These little gems save weight and spin the engine to the point where you practically dare the engine not to start. Also, there would be no more embarrassing attempts at getting a hot fuel-injected engine to start. As Gary Gadberry pointed out, the most important thing is to remember to release the starter almost immediately, as the engine is probably already running.

many places.⁸ Aerosmith's signature repair was the reinstallation of the windshields, using the fully restored surrounds, finishing with an installation that looked better than factory new, including a flex strip between the surround and the rest of the nose that should not crack in the foreseeable future. This takes us up through about March, 2003, and we picked up what looked on the outside like a brand new Aero Commander Shrike from Aerosmith. This was the "rebirth" of the Commander, and her registration was changed to N799CE, since the Coats & Evans law firm began operations on July 1, 1999.

Everything was shaping up nicely except for the pointy end where we still needed to address instrument panel issues. Even before we began the renewal of the panel, a key addition was made that continues to be one of the most useful in-flight devices available: the Flight Cheetah FL 270 by Echoflight®. The business end is a 6.4 in. VGA resolution, daylight readable multi-function display residing in a black box. The display is connected by a stout cord to a "brick" computer running Windows 2000®, along with a DC power supply and a modem, all of which are powered through the Commander's electrical system. This WAAS GPS, moving-map, terrain displaying/alerting, approach following, database containing, chart displaying piece of technological wizardry provides the pilot with all of the information possibly needed in flight, and I am quite certain you could get it to change the engine oil if you knew the correct key sequence. It even provides in-flight data send and receive capabilities, including real time weather (nexrad, metars, etc.), and e-mail, and also displays all of the NOS approach charts, including SIDs and STARs. I encourage anyone seeking a manifold increase in their level of situational awareness to check out this marvelous and cost-effective technology at www.echoflight.com.⁹ Recent additions to the Flight Cheetah's capabilities include traffic alert and attitude gyro functions. The solid-state electronic gyro can be displayed in either a small corner of the display, or the entire instrument can become one large attitude display.¹⁰ Giving new meaning to a "temporary" installation, we at first propped the Flight Cheetah display between a flight case and the alternate air controls on the throttle quadrant, securing it with the time

⁸This is where Wayne and I hit it off. As he was inspecting the Commander after we arrived in Longview, and looking at the windshield, he took his key and flaked off some of the bondo, whereupon I stated that I was not paying for that repair. Wayne was appropriately amused. While it should be apparent from my comments, I have the highest regard for Wayne and his crew, and they did a wonderful job with the Commander.

⁹Years ago when I was a line pilot for Amoco Corporation, the flight department spent thousands of dollars (over six figures) for data-link capabilities, installing equipment that did not do ten percent of what the Flight Cheetah does today. As an example, we flew the Commander to the summer 2004 LPBA meeting in Sunriver, Oregon. Because we were not pressurized, we wanted to fly as low as possible consistent with terrain avoidance. It was a simple matter of establishing the cruise altitude, and then monitoring the terrain depicted on the Flight Cheetah for any terrain elevations that would become an issue. The accuracy of the underlying terrain display was nothing less than spectacular.

¹⁰The Commander has great operational redundancy built in. For example, the pilot's attitude gyro is AC powered, and the co-pilot's is a vacuum unit driven by pumps installed on both engines. In instrument conditions, the Flight Cheetah's electronic gyro will break the tie in the event the ship's attitude gyros disagree on what direction the aircraft is pointed.

honored technique of using Velcro® strips. Although this was useful, it was not a long term solution or one that fit into the rest of our plans for the panel.

Exterior upgrades and paint completed, but instrument panel to go, was essentially the configuration when we flew the Aero Commander to Branson, Missouri for the summer 2003 LPBA meeting. We had already ditched most of the old eyebrow instrument panel, and replaced it with a simpler version containing just the audio panel and the air conditioner controls. Some temporary covers had been installed where voids were temporarily left in the panel (with structural two-sided tape), which brought comments from Charlie Finkel every time they fell off during the LPBA spot landing event. The Commander had only the Garmin 430 for communications and primary navigation during this time, so additions were due in short order if she was going to be flown in IFR conditions or at night. This was when the real fun started.

Trouble shooting the “three-in-one” vintage engine instruments revealed that one had an internal leak. Off we sent both of them for rebuilding. Since they were originally installed low in the center instrument panel section, substantial disassembly of the panel was already required. As we delved deeper into the panel, additional problems were discovered, so we made the decision to completely replace the panel. Although it was mid-summer 2003, we had still not incorporated the Commander into fulfilling the firm’s travel requirements just yet, especially with the engines coming up for replacement as well. Enter Ron Connor and Mike Bice. Ron runs Southern States Aviation at David Wayne Hooks Airport (“DWH”), an avionics shop with tremendous expertise and capabilities, and Mike is nothing less than a magician with metal work and finishing. Opening the kimono of the instrument panel revealed everything that you did not want to see. Clearly the piecemeal updates to the avionics over the years had taken their toll on the ship’s wiring. In addition to the dysfunctional eyebrow panel, the pilot’s instrument panel had been reworked in an apparent effort to tilt the lower section upward. This change almost certainly weakened the assembly, and there were numerous cracks that confirmed that its apparent stability while installed was just an illusion. The center panel was the closest to being intact, but of course it would be replaced along with the other two. The co-pilot’s panel had been thoroughly massaged as well, and was quite a mess. Worst of all, the circuit breaker panel had every type and orientation of circuit breaker, and was connected to the rest of the aircraft with two massive cannon plugs, both of which were electrical accidents just waiting to happen.

So the stage was set. Ron and his folks completed gutting the former panels and associated wiring. All but a small portion of the avionics wiring was replaced, and the Commander lost over thirty pounds in no-longer-needed radios, wiring, and mounting brackets, leaving an impressive box of leftovers. Of course, the former panels were used to adorn the airport office in a neo-modern gray aircraft artifact motif. No opportunity was lost with the entire forward section of the Commander open and available. In addition to the avionics wiring, all new hoses were run from the various manifolds and fittings to the gauges and flight instruments, and sound proofing material was laid in under the glareshield. We had previously re-installed a cylinder head temperature gauge when it was determined that the aircraft did not meet its type certificate without one, and the original instrument had departed the aircraft, even though the engine analyzers displayed CHT for all six cylinders. Starting from scratch was the perfect opportunity to put all of the instruments where they belonged, and rearrange we did. The most significant change was moving the Manifold Pressure, Tachometer, Fuel Flow, and Cylinder Head Temperature gauges in to the prime instrument panel real estate

vacated when the Gables head radios were replaced with rack-mounted avionics in the center stack. This was an ideal location for these instruments, and they were fortuitously short enough to fit in the eyebrow panel perfectly. This freed up some center panel space, and the engine analyzers were placed just above the gear handle, and the “three-in-one” gauges just to their right in the co-pilot’s panel. Lastly, a Shadin altitude alerter was installed, not only as an essential safety device, but also because I spent so many years operating aircraft with altitude alert that something just seemed out of place without one.

As the new wiring took shape, other enhancements were made as well. The former instrument panel used the venerable post-lamp for illumination at night, and there were as many inoperative as there were dissimilar types and styles. All of the post lamps but one were replaced with electro-luminescent ring lights that were sandwiched between the instrument and the panel, bathing each instrument in an even glow that is unmatched for night flight. If you are wondering, the one remaining post lamp illuminates the outside air temperature gauge mounted high on the pilot’s windshield. We also discovered that the pilot’s HSI was not internally lighted. No - we were *not* about to install a few select post lamps to remedy the situation, leaving us looking for other alternatives. Changing to the correct dash number for an internally lighted HSI left me believing that the Air Force might have gotten a great deal on some of its toilets, and I did not want to have the overhead floods turned up for one uncooperative instrument. Rationalizing that new technology was better than old, we decided to install a Sandel 3308 electronic HSI, which turned out to be the perfect complement to the existing Garmin 430. For redundancy purposes, we also needed back-up communications and navigation capabilities. With Commanders being notoriously instrument panel real-estate challenged, we selected the Apollo SL30. This low-profile but full featured nav-com is a superb comm and nav radio in its own right, complete with a built-in CDI display, all residing in an extreme low-profile design that is the same height as a DME or transponder. Mike even fashioned a totally new circuit breaker panel that Ron filled with the proper breakers, at the same time eliminating the cannon plugs. Mike’s piece de resistance was an engraved circuit breaker overlay, back lighted with an electro luminescent sheet, that glows at night just as beautifully as the ring lights. Last but not least the original “8-day”¹¹ analog clock was replaced with a Davtron multi-function digital clock.

The instrument panel replacement turned out to be as much a work of art as it was of perfect utility, using a configuration infrequently seen in Aero Commanders - a single stack of radios in the center section containing the Garmin audio panel and 430 GPS, the Apollo SL30, a King DME, and a Garmin transponder. Mike engineered and installed a two-piece panel system that fit perfectly using the manufacturer’s mounting hardware and attach points. If you want to have some idea of the fit and finish that Mike put into the project, just look at the panel where it meets the landing gear handle surround. On most Commanders, there is substantial space around the gear surround (which is normally plastic) and the panel, and any consistent alignment of the two is probably an accident. Mike rebuilt the gear surround out of metal, and then fit the panel so precisely that I doubt that you could fit a business card between the two. The panels themselves were finished in panel gray powder-coat, which is an extremely durable finish, and then hand engraved with all of the required placards and warnings. The center pedestal was disassembled, stripped, powder-coated in black crinkle finish, and then reassembled. The yokes were then stripped and refinished in the same black

¹¹My suspicion is that this nomenclature is derived from how long it takes to wind it up.

crinkle finish as the pedestal. Although not an EFIS cockpit by any stretch, we ended up with dual GPS, dual navigation databases, and three moving map displays in the Commander. The overhead panels had been stripped, refinished, and engraved while the Commander was at Aerosmith for paint. No detail was overlooked, the overhead trim wheels were removed and refinished in powder-coated black crinkle finish, and even the starter switches, fuel shutoff covers, and gear handle were repainted in bright powder-coat red.

Mike then turned his attention to the Flight Cheetah; it was apparent that he did not want our Velcro® solution being in such close proximity to his fine metal and finishing work. The result was a removable pedestal extension that positioned the Flight Cheetah display screen perfectly between the crew seats, and yet allowed easy access to the autopilot, cowl flap switches, and flap handle. Also finished in black powder-coat crinkle finish, it could easily be appropriate for any modern corporate jet. Being removable, the display unit can be placed directly before either pilot/crew member, and removed to allow easy ingress and egress to the co-pilot's seat. Mike also recovered the glareshield in black leather.¹² Although the interior was in generally great condition, including the passenger seats, the crew seats were in pretty sorry shape. When the panel was pretty much complete, we asked Jenny Darling, who runs Aero West Interiors at West Houston Airport ("IWS"), if she would help us with the crew seats. Jenny recovered the seats in sheepskin and leather that matched the rest of the interior, but best of all she included upgraded seat foam and proper lumbar support. After more than nine hours in the Commander on a single day, and even though other parts of the body might be complaining, the seat support and comfort remain superb.

After all this work on the airframe, the engines were approaching 1600 hours since overhaul. Even though they ran perfectly, they were prone to consume some oil that would eventually become deposited on the tops of the nacelles upon exiting the exhaust. We had no allegiance to the engines that had been on the aircraft, and wanted to minimize the down time, so a full engine exchange was planned. Following a thorough search, we asked Barrett Performance Aircraft in Tulsa, Oklahoma, to build two zero-time engines, and build they did. Barrett essentially "blue prints" their engines, and uses advanced equipment and techniques to balance and fine tune the engine for optimum performance. Arriving a few days apart, the engines were expertly installed by Joe Washburn and his crew at Texas Turbine and Prop, also located at DWH. The removal and reinstallation of engines, including the associated cowling and baffling, is as much an art form as it is a science. We took the opportunity to thoroughly clean and refinish the insides of the cowlings, and following a technical analysis of the engine mounts, they were repainted as well. Most of the hoses behind the engines were also replaced. The result was an engine installation that looked factory new, but would they run? Both engines started during the very first start attempts, and have not skipped a beat since. Part of my theory going into the Commander was FIRTFT¹³ (fix it right the first time), thinking that applying FIRTFT would tend to reduce the ongoing maintenance bills. So far this theory has been confirmed. For approximately the last one hundred hours on the aircraft, both before and after the engine removal and reinstallation, we have had no significant discrepancies on the Commander. Ron, Mike, Joe, and Wayne should be very pleased with this flying testimonial to their superb work.

¹²Even though the Commander is based in Texas, I am confused: is it the *smell* of boots and the *feel* of leather, or the *feel* of boots and the *smell* of leather?

¹³I do not know who is supposed to get credit for this saying, but I appreciate the opportunity to plagiarize it here.

So what did we end up with? An air-conditioned, cabin-class reciprocating twin-engine aircraft that will carry up to seven people in comfort, at 180 knots, burning approximately 32 gallons per hour. It is also a superb sightseeing aircraft as well¹⁴, and the trip to the LPBA meeting in Sunriver was a testimonial to the aircraft and its capabilities. After a rather mundane trip to Pecos, Texas for fuel, we flew into Sedona, Arizona for an overnight stop.¹⁵ Departing early the next day, we flew the VFR corridors over the Grand Canyon, went straight west over Las Vegas, flew up the eastern side of the Sierra Nevada, crossed over the Sierra at Mammoth Lakes, passed over Yosemite National Park, and then flew straight into Napa, California for two nights. This leg was flown in three hours forty-five minutes of flight time, and we landed with over an hour of fuel remaining.¹⁶ A few days later we flew straight north past Mt. Shasta and Crater Lake into Sunriver for the meeting. During the meeting, we went on a local sightseeing tour over Mt. Bachelor and the Three Sisters, and then around Crater Lake and back to Sunriver. LPBA Journal Editor/Department of Justice attorney Gary Allen was at the controls for most of that flight, and it was no wonder he was smiling the rest of the week. Saturday found the Commander once more entertaining the LPBA troops during the spot landing event, once again with Charlie Finkel along for the ride. This time the panel stayed together, and even though Charlie expressed with each circuit his disappointment that we were not getting close enough to the line, we once again eked out a closest-to-the-line performance. The return from the summer meeting took us to Provo, Utah for fuel, to Lubbock, Texas, for food and fuel, and then back to DWH. Almost the entire trip was flown in superb VFR conditions, and the Flight Cheetah enabled almost direct routing with minimal deviations for terrain, with the Sunriver-Provo leg flown at 9,500 feet, and the Provo-Lubbock leg flown at 11,500 feet. In over thirty years of flying and over 11,800 flight hours, the Sunriver trip ranks number 1 for displaying the magnificent beauty of this country.

The Aero Commander is also a tribute to my parents, both of whom were pilots. My mother Helen began flying in 1944, was one of the first ladies to learn to fly at Ohio State University, and received her Private Pilot's License in 1945, flying a Taylorcraft with a 65 hp Continental engine. She served as an Assistant Coordinator for the Naval Air Cadet program from 1942-1944, and Assistant to the Director of Aviation from 1944-1951. She is a current member of the 99's and the International Organization of Women Pilots, and served as Chairman of the All-Ohio 99's Chapter from 1948-51. My father John began flying in 1930 when he purchased an American Eagle, and became a career professional pilot. He flight instructed for the Ohio State University, and later served as Chief Pilot for the State of Ohio Department of Transportation, where he flew an array of aircraft, including the Twin Beech, an Aero Commander 680, and the King Air C90, for over thirty years. As one of the state's pilots, he flew not only passengers, such as the Governor and state

¹⁴Tour operators in Australia replace the side windows with bubble windows and use Aero Commanders for reef sightseeing trips.

¹⁵Known as the home of the "Vortex," Sedona also has Vortex's at the airport, as it sits squarely atop one of the numerous mesas in the area, hundreds of feet above the valley floor. This is one of the few areas where you can experience severe turbulence even after the landing.

¹⁶This was yet another instance where the Flight Cheetah proved invaluable, as we continuously monitored the Napa weather to see if the fog would lift in time for our planned arrival, the forecast weather notwithstanding. Of course, the fog rolling into the Napa valley is just one of the unique local conditions that makes it so fertile for grape growing.

representatives and employees, but he personally took most of the aerial photography required by the state for many decades in aircraft set up for that purpose. Because of his experience with the venerable OX5 engine, he was also an OX5 Aviation Pioneer. My father retired in 1975 with over twenty-thousand flight hours, and never put a scratch on an airplane. Sadly, he left this Earth on December 3rd of 2003 just a few weeks shy of his 93rd birthday, following a long battle with progressive heart failure. Although he did not get a chance to ride in the Commander due to his health, he did have an opportunity to visit her at Ohio State University Airport during more than one visit home, and I will never forget the knowing sparkle in his eyes as he gave his approval to this very special project. Our Aero Commander reaches back to an earlier era when my parents created an aviation family, and honors their special contributions to aviation.

The Commander continues to excel at what she does, and as of this writing we have experienced 100% dispatch reliability since she was purchased. We currently have on order the new “Raven” from the folks at Anywheremap, a stand-alone flight computer that will reside on the pilot’s approach plate holder, and with its addition, the Commander will have a grand total of three GPS’s, up to four moving map displays, and independent sources of approach charts, finally becoming a truly paperless cockpit. Although most of the difficult renovations have been completed, it is always a pleasure working to preserve this important page out of aviation history, and the labor of love that is the Commander turns out to be no labor at all.

BEFORE & AFTER

