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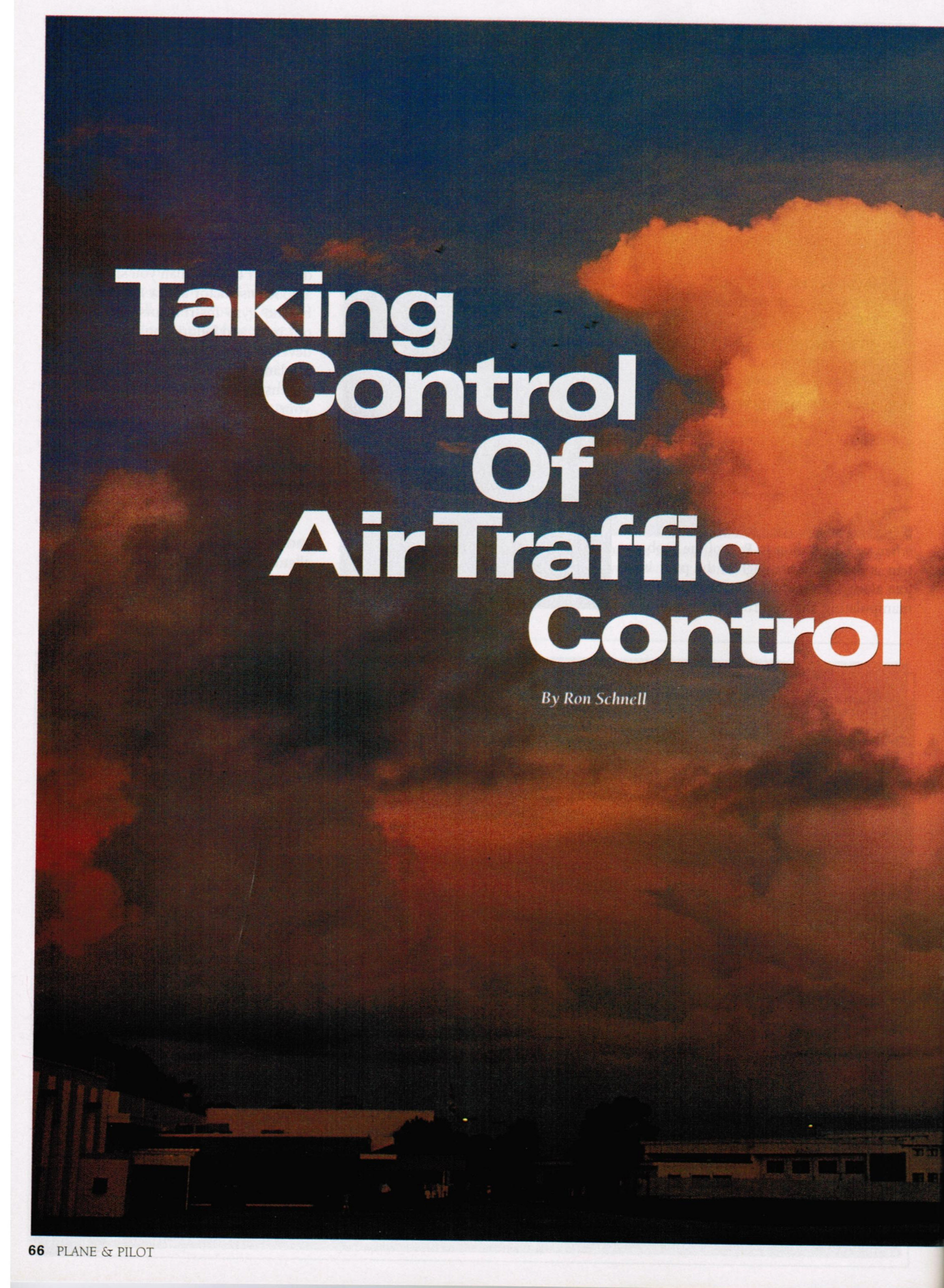
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# Taking Control Of Air Traffic Control

*By Ron Schnell*



*ATC can offer valuable information about airborne traffic, but what about weather?*

**M**y plan was to fly from Miami's Opa Locka airport to Baltimore-Washington International with my cousin, Aaron, a student pilot. The trip was well within the range of the Mooney Bravo, but some weather north of South Carolina called for us to make a stop in Charleston and take a look before proceeding. When we landed at Charleston, we went into the flight-planning room and had a look at the WSI radar. It didn't look very good over the Washington, D.C., area, and it seemed like lunch was in order. We took a car over to a local greasy spoon and ate lunch while watching the Weather Channel. It didn't seem to be improving very much, but we'd be able to see a lot better from the airport.

When we got back, the radar picture was still disturbing. There was a thin, but very dense, line of yellows and reds going from just north of Charleston up to the D.C. area and extending slightly to the east. The line was moving exactly northeast—along its long axis, so to speak. This meant that there was no way to wait it out, unless we wanted to wait until the next day.

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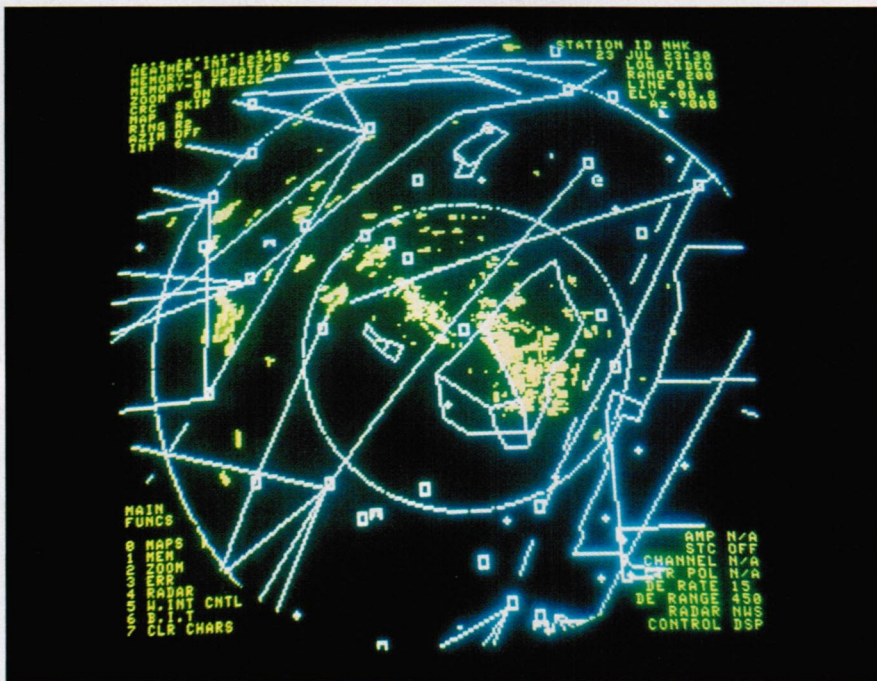
## CONTROL

But it certainly looked feasible to fly west of the line until abeam Baltimore, then get a look to the east. From 21,000 feet (our flight-planned altitude), we should be able to get a good view of what's to the east. If it looked foreboding, we could simply land at one of the airports well west and either wait for a hole or drive over to Baltimore. There were many options.

We had a very scenic trip up to the northeast, with some beautiful country-

me that there was a nice hole that way. He told me to descend to 7,000. I took him at his word. This is what I called the "mistake" part of the trip.

We got bounced around in very moderate turbulence, and the Stormscope showed us being very close to the stuff you really want to avoid. The whole time, the Stormscope was showing the area of the Nottingham arrival as the best way to go. In the meantime, we had been switched to Patuxent approach. I asked them for vectors around whatever we were in and was informed that they had no weather capability at all. As I thought



**A typical air traffic controller's radar is designed to "see" traffic, not weather.**

side below us and some very impressive storms due east, paralleling our course (in reality, our course was paralleling them). We were doing 280 knots across the ground as we rode the low-pressure system northeast. As we approached northern Virginia, ATC cleared us to begin a descent down to 7,000. I requested that we remain higher due to weather, and with some disdain, they agreed to allow us to stop our descent at 15,000. At that altitude, we'd have no problem seeing the bad stuff. We were cleared for the Nottingham arrival, which, according to our Stormscope, would be perfect for avoiding the plentiful static electricity.

The next controller told us that they cleared us for that arrival in error, as it's only for turboprops. He gave us a full route clearance that would take us right into where I thought the bad stuff would be. I shared this with him, and he assured

about it, I realized that it didn't really make a difference if they had weather capability or not. It certainly didn't help the last sector, with their claims of the "nice hole." I started deviating based on my Stormscope (we were in solid IMC) and made it through.

It's interesting how some air traffic controllers do everything possible to make sure the pilot understands that their weather radar is unreliable at best, and others act as though they can see the weather better than you can, even though you're staring right at it. I've seen this a lot, especially flying in south Florida, where the thunderstorms are many and the stratus are few. I've told ATC that I needed to deviate for weather, and they have insisted that there's nothing there because there's nothing on their traffic radar scope.

The next day's leg was from Baltimore to White Plains, N.Y. With the previous

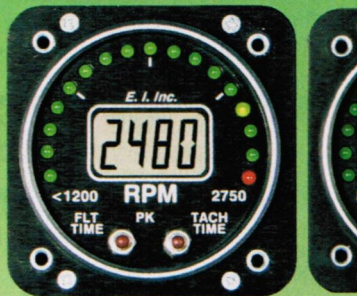
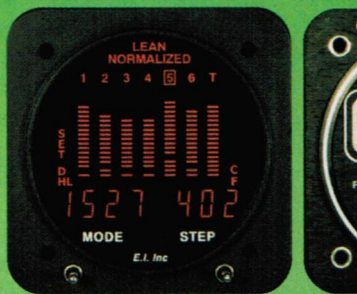
leg fresh in my mind, I went straight to the WSI radar at the FBO, which showed a solid line east of Baltimore, extending south about 60 miles and north up to Buffalo. I filed for route around the bad stuff, and the FSS briefer put into the remarks that the routing was for thunderstorm-plan avoidance. It was well out of the way, but looked very safe.

When I called for my clearance, I was given a routing to the east and northeast, which would put me right into the hail and tornados. I replied that I was unable to accept the clearance and that it would put me into thunderstorms. I also reiterated the beginning portion of my filed routing and said that this is what I would need. This took the clearance controller a bit by surprise, and she told me to stand by. She came back and asked me to contact her supervisor on a different frequency. The supervisor again tried to clear me into the mess. I informed her of the problem with that routing and again told her of my proposed route. She asked me if I had weather radar, and I said, "Not onboard." Her response was disturbing: "On a day like today, with a plane like yours, you shouldn't be flying."

Now, I fancy myself a very careful and conservative pilot. If there's any possibility of danger in a flight, I'm happy to wait it out. But looking at the WSI radar, it was very obvious to me that my proposed routing was without danger, and anyone who didn't go that way was in danger. The tops of the storms were above 50,000 feet, and even the airliners wouldn't be able to get above them. I told her that I had a good view of the ground-based radar, that my flight-plan route would keep me clear of any weather, and that at my filed altitude of 15,000, I'd have a good view from the air. I said that if it would make her feel better, I'd change my altitude up to 25,000. She responded, "Well, I can clear you what I gave you, and you can request deviations from approach control." She then read me the convective sigmet associated with the line, emphasized the hail and tornados, and said, "Good luck."

Ten minutes later, I was departing to the northwest, climbing up to an initial altitude of 9,000. I was in clear skies, with a great view of the 400-mile-long monster to my right. Approach was extremely busy and cleared me to fly heading 040. I responded, "040. I'm gonna need a deviation to the south pretty soon." No response. An airliner chimed in and said that they'd need a heading 190 for weather. Approach responded, "You aren't going to get around it to the south. We're sending people through a hole to the northeast. We're

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# CONTROL

gonna get you through that way." I knew this wouldn't work well, and apparently, so did the airline pilot. "You must be seeing something we don't see. But we're turning 040." The airline pilot was trusting the air traffic controller's traffic radar over his own weather radar—just like I did the day before with my Stormscope. I wasn't going to do that again.

I was braced to transmit my deviation request again as I was getting closer to the Beast, but couldn't get a word in. The sector had become saturated to the limit with

mation, your weather data is [bleeped]!" I could only imagine what that 737 full of people just went through. (Eventually, I didn't have to imagine; as it turned out, I knew someone on the flight who described it to me as the worst turbulence ever.)

After my turn direct to Sea Isle was complete and I was level at 15,000, I informed Center that I was done deviating and was now direct, and gave them a little advice: "This deviation is the way to go for eastbound traffic. I was in clear skies the whole time."

As I was enjoying the sunshine, I thought about what would have happened had I not taken proper control of the situation. The pilot has the ultimate responsibility

**NOAA's National Climatic Data Website contains archived radar images that are not only useful for research, but also offer a post-flight look at what you went through.**

people stepping on each other on nearly every transmission. It got to the point where I had to turn to avoid flying the plane into my probable end, so I did. I turned heading 190—the heading that the airliner wanted to turn, but didn't. It was the perfect heading to parallel the line with the intention of getting around it. I eventually got to transmit and said that I "turned heading 190 for weather." Approach asked how long I would need that heading, and I replied, "About 50 miles." They seemed very dubious that my plan would work, but I knew it would, based on the ground WSI radar and my Stormscope. I was still in sunshine and could even see the bottom of the line.

As I was turning the corner to the south of the line, the airline pilot had something to say to the controller. "Just for your infor-

for maintaining safety. If I had flown into that Level 5 thunderstorm and my plane had broken apart, I would have been blamed for the accident. Not only would I have been at fault for flying into weather beyond the capabilities of the aircraft, but the tapes would have clearly shown the ground controller supervisor telling me that I shouldn't be flying on that day. People reading the NTSB report would have been astounded that I took off. By understanding the weather and following a plan that was filled with options and based on safety, I got a sunburn instead.

Air traffic controllers are highly trained experts, specializing in just that—traffic control. Don't make the mistake of relying on them to make your weather decisions. That will always be the job of the pilot. P&P