

## "Dirty Dan" Rutherford By Buzz Wilson

This article is about some of Dan's contributions to Model Aviation as well as his unique character. Dan was one of a kind and will be missed.

Dan's nickname was "Dirty Dan." I never understood the moniker nor did I ask him where it came from. I started calling people who knew Dan and finally got an answer. Charlie Johnson told me that it came from Dan's dirt bike days when he would spin the knobby tires and throw mud onto the visors of opponents.

I first met Dan Rutherford at Marymoor Park in Redmond, Wash., some 50 years ago. It was a Wednesday afternoon and I was playing softball when I heard a familiar sound from my youth. When the game was over I followed the sound and there were a bunch of guys about my age (late 20's) Dan Rutherford, Ron Scoones, Gary Stevens, Phil Granderson, flying model airplanes.

### GollyGeeWhiz

Dirty Dan designed the GollyGeeWhiz out of necessity. Around 1974 a group in the Northwest started promoting .049 Combat. It caught on fast, and it was not long before they realized that there were not any decent .049 Combat kits on the market. Into the breach leaped Dirty Dan and his GollyGeeWhiz!

PRETTY FUNNY name, right? But it fits! Dan would ask people who fly AMA (Fast) Combat if they would be interested in flying some .049 Combat, and they said, rather sarcastically, "Golly Gee Whiz. I don't know if I can handle it." After a "little" pressure, he would get them to try one of his planes, either in a match or solo. After trying the plane and seeing what it could do, the comment was still "GollyGeeWhiz!", but all of the sarcasm was gone!

Modesty forbade him to claim his design as the ultimate but it was the best he had seen. The plane was easy to build, had good top speed, turned tight, and would survive being repeatedly plugged into the ground. Without fuel his plane's ready-to-fly weight was 4-1/4 to 4-1/2 oz. (prop, bladder tube, engine installed).

To help those who were just getting into Half-A combat, Dan provided the following:

*"There are a couple of things to do before going out to fly your new GollyGeeWhiz. Optional, yes, but they not only add immensely to your total enjoyment of Combat flying, to ensure that you will arrive at the field looking like a Combat jock, not a turkey. First, you have probably noticed Combat fliers' "flippin fingers" are always cut and in various stages of healing. The quickest way to get your "Combat hands" is to stick your fingers in a running prop. Felt good, didn't it? If it hurts too much, bite on an old glow plug. Do not bandage your fingers. This way everybody will be able to see how active a Combat flier you are. As long as you have some fresh cuts at hand (so to speak) practice pouring raw fuel on your cuts without wincing.*

*Second, you are going to have to get yourself accustomed to the minor aggravations that go along with using pen bladders. Try to blow one up with fuel using your regular fuel bulb. Can't do it. Squeeze harder! Use both hands! Yuk, yuk, blew the end right out of your fuel bulb didn't you? Go get a 2 oz. dose syringe at your local veterinarian, or your hobby shop may have one."*

### Dirty Beaver

In 1974 the Li'l Snip was designed for the Western Associated Modelers (WAM). It was prompted because there were no serious Half-A Combat Models on the market. Those that were on the market were for use with the Baby Bee or Golden Bee engines.

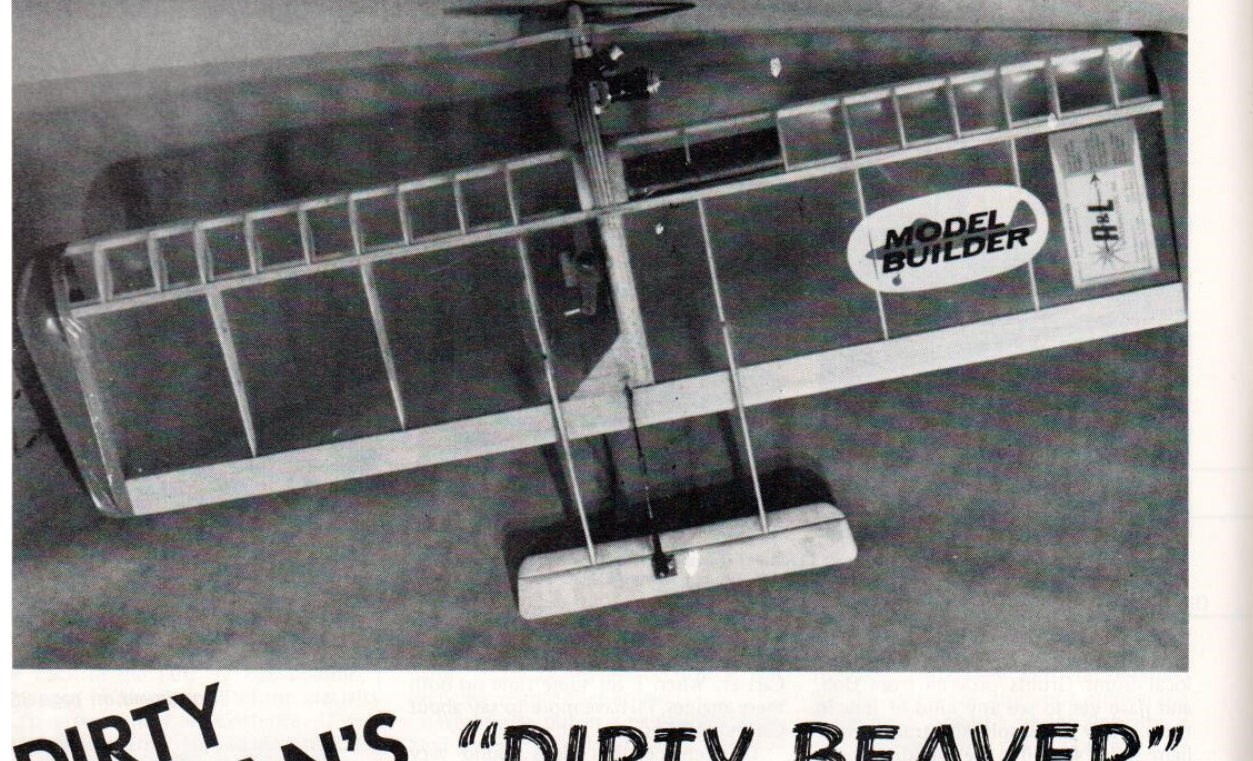
Paraphrasing from an article by Dirty Dan, Charlie Johnson came out and said that .049 Combat was the lowest form of Combat and wasn't worth bothering with (Charlie was writing the Combat column for Model Aviation). Then in 1977 Dirty Dan Rutherford designed the Dirty Beaver. Originally meant to be a tuner-upper for the hot shot Combat flier, it fit right into the event that was gaining popularity. The Dirty Beaver was designed by and for serious Combat fliers interested in doing a lot of Combat flying. These planes used TeeDees that could turn 23,000 RPM on 60% nitro.

The following in quotes, is from Dan's March 1977 *Model Builder* Article on the Dirty Beaver.

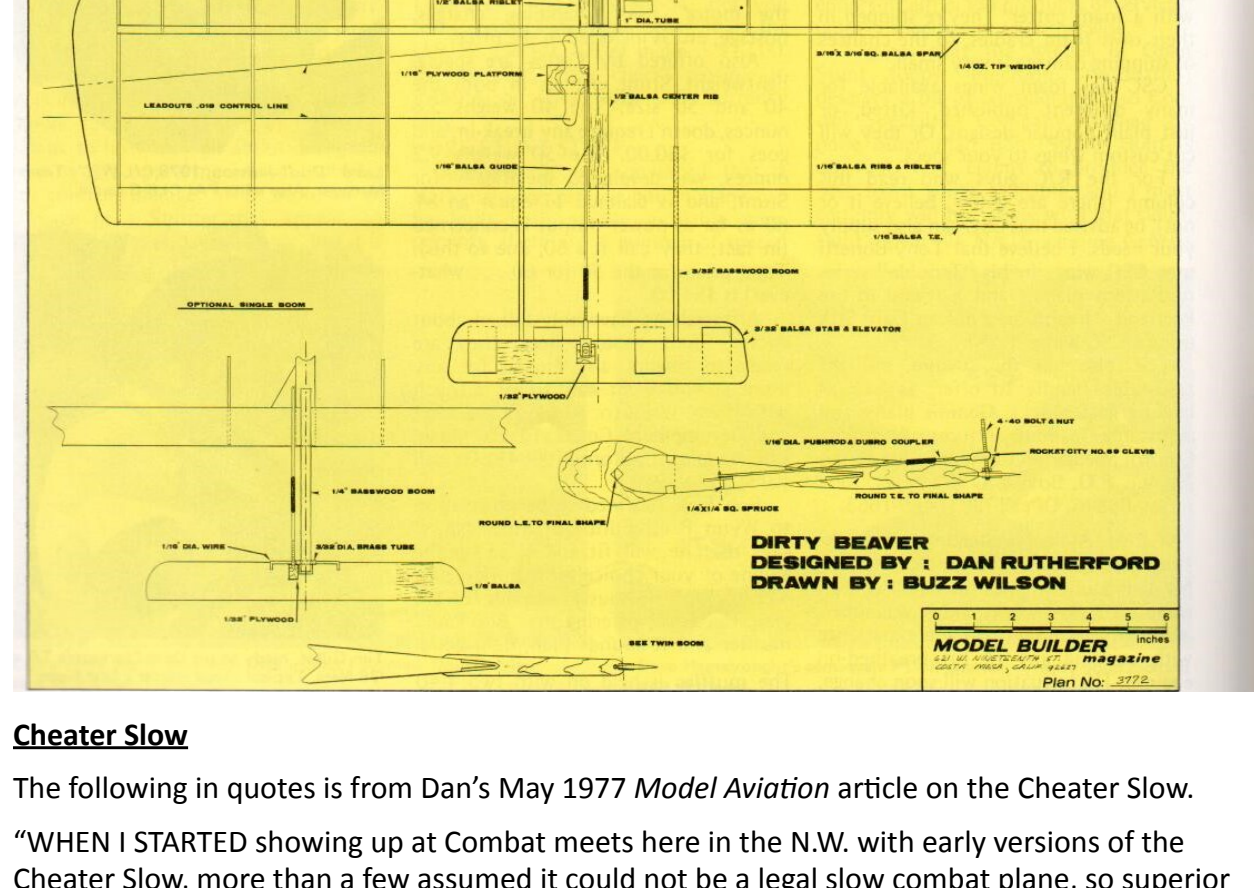
"They are not for contest work, they are for going out once or twice a week and flying "grudge" matches against the meanest, baddest Combat flyer you can find. I have found that it is to my advantage to fly touchy, wiggly, mean bad-n-nasty .049 Combat planes. This style of plane requires constant attention while flying. Make a wrong move and you miss a cut or kill ... maybe even smack the ground. Put simply, this kind of plane gives you a very "educated" hand in short time.

"Once you get to the point where you are effective with a plane like mine, a good honkin' Fast Combat plane feels extremely pointable and docile, *Docile!*? An AMA combat plane that feels docile? Yes, that's right, but you'll have to try it before you'll believe me. I've given you a shot at it with this article ... all you have to do is build a design that took me two years to develop to this point."

Dan shipped Charlie a complete Dirty Beaver with engine, lines, handle, etc. all he had to do was put fuel in the Bladder. Charlie did a complete 180 on his impressions of .049 Combat. He found that a proper .049 Combat plane can set even the most experienced Combat flier back a bit with performance that is regarded as possible only with 35 size (AMA Combat) planes.



## DIRTY DAN'S "DIRTY BEAVER"

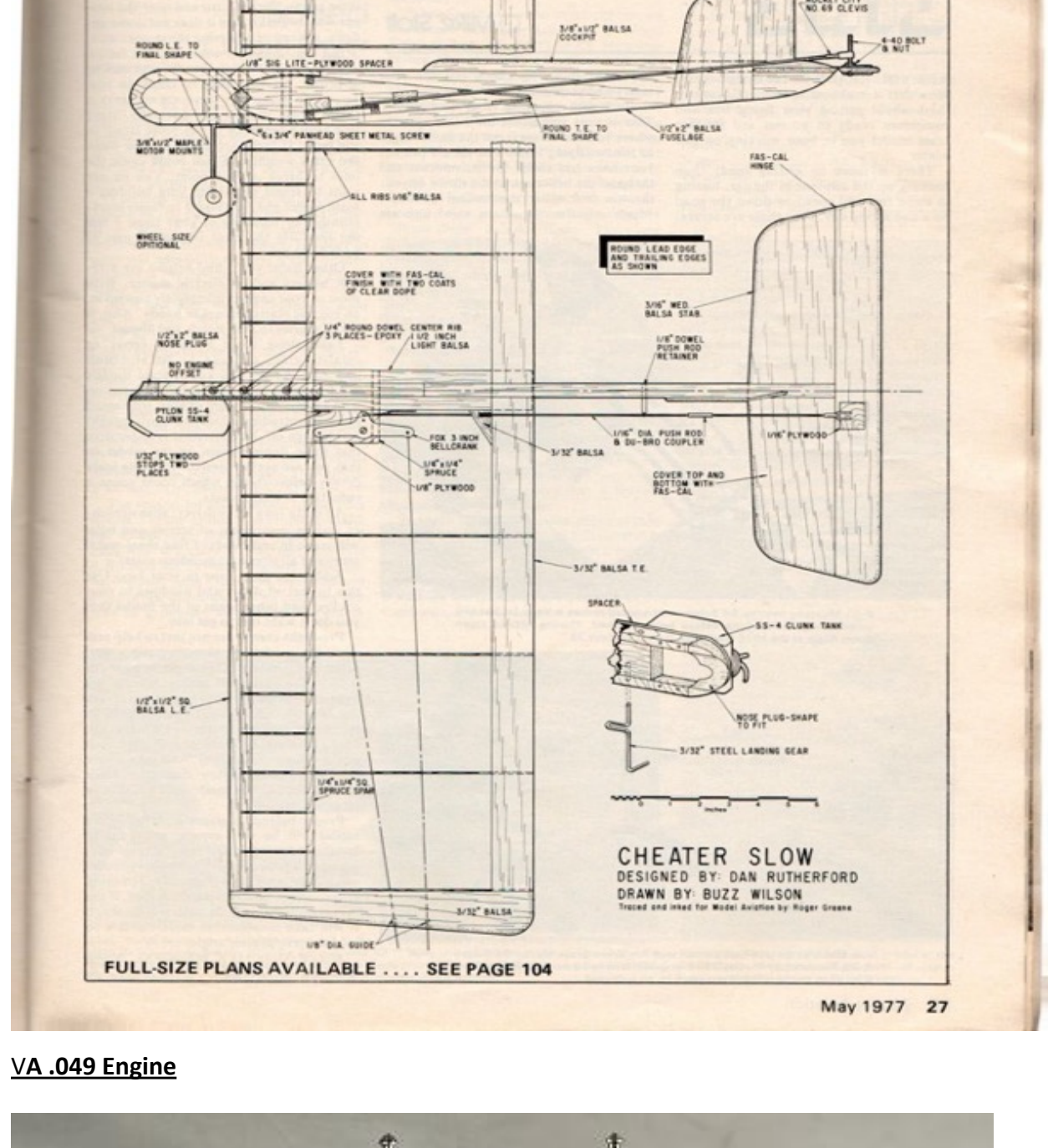


### Cheater Slow

The following in quotes is from Dan's May 1977 *Model Aviation* article on the Cheater Slow.

"WHEN I STARTED showing up at Combat meets here in the N.W. with early versions of the Cheater Slow, more than a few assumed it could not be a legal slow combat plane, so superior to existing equipment. Close inspection by the nitpickers verified that the plane is legal. But to keep them guessing, I thought it a good idea to hang the "cheater" label on the plane!

Ugly you say? The beauty comes through when an opponent can't follow you through manuevers. Or when you are following and can turn with him without having to use full control. I've won a lot of matches with this design. It long ago quit looking ugly to me."



### VA .049 Engine



At the 1989 Nat's in Richland Washington, a group from the Soviet Union was invited to participate. Valentine Aloskhin (VA) was one of the group. Dan Rutherford saw that he was paying considerable attention to the TD .049 and told Dan that he was not that impressed and that they could make a better one. Thus began the development of the VA engine with Dan. In March of 1993 the proof of tooling engines arrived. One obvious concern was that the cases were not the prettiest and to make matters worse they had nickel plated them. He showed them to Jeff Rein. In 1994 Dan received the first production run and was looking for a guinea pig to buy a motor, work with it, see how user friendly it was to use, and see if a seasoned flyer ran into any issues that would cause concern for mass distribution. Jeff was prefect for the job and had a few issues that Dan had not counted on. From then on, they worked together

Jeff had ideas, and Dan was enthusiastic about him trying new things. After working with about five motors, Jeff had come up with seven different minor inconsistencies that affected the performance. Each motor was slightly different, Jeff found that they could go through and check all 7 points of interest on each motor, and they would run identical.

He would blueprint each motor for fit. The crankshaft in the case fit was the most important. He reamed the case with a "J" drill bit. This gave most motors 1,000 + RPM and prevented the overheating problem many of them had, leading to lean runs after about one minute running. He would also lap the piston a bit to what he felt was a perfect fit without drag, which was NOT recommended by the manufacturer. The other things were very minor, he just chose to check them.

Dan called the motor RYOT, Roll Your Own Timing. Dan liked to shim his pistons with .004"-.006" above the top of the cylinder for more torque. Jeff went the other way with his research and set his up .000" for RPM. Set this way, he had to run a smaller prop to get the RPM up in the range of the new timing. He kept cutting the rubber ducky down (Cox 5X3) and trying it on his 36" wingspan 1/2A plane. The more he cut, the faster it flew and pulled in the turns. He finally ended up 2-3/4" diameter on his contest prop.

New problem. at 30,000 RPM and 40% nitro, he started going through rods on a regular basis. After he broke one just after he killed his opponent at the 95 Nat's, Jeff decided to try something new — rod development; that is an entire story in itself.

### Beyond the VA

Other engines that came on the scene were the Shuriken, CS, A.D., AME and Stels.

The first Cyclon was produced in 2000. Alex shipped 100 to Doug Galbreath. I purchased two of these, and 24 years later they are still running strong. Later entries into the engine market were Fora and Profi.

### 95 Nats Lost for Words

Those of you who knew Dan, know that he was never at a loss for words. Joe McKinzie, a Combat flyer from Texas, is the only one that I ever knew to leave Dan speechless. It was at the 1995 NATS in Richland WA. Dan was importing the VA .049 from Russia. These were known to flood and be extremely difficult to clear the flood. Joe said "Dan I finally figured out how to clear a flood from a VA. You disassemble it and dry the parts off with a towel."

It was at the 1995 NATS in Richland WA, that two other memorable quotations came out. The first is from Norm McFadden. I was flying Norm and before the match started Norm said "This is the only opportunity I will ever have to bellcrank a nuclear reactor." The next was from Joe McKinzie. When Joe was asked by Jeff Rein why he was the only Texan at the Nats, he responded, "It only takes one Texan to win the contest."

### Model Builder

Dan was the longtime control-line author for *Model Builder*. This began around 1976. When I saw his article on pit boxes I knew I had to have one. His was tricked out with toggle switches with safety covers, a meter to tell if the plug was good, and a rechargeable battery. Holders for plugs and tools. Up until then, people would go to the garden section of the local hardware store and get a garden tote. The switches and meter had come from the Boeing Surplus store. The rechargeable lead acid battery from a surplus store in California. I still have a new one.

### Bladder Grabber

Bob Carver came up with the idea for the Bladder Grabber, but it was Dan who named it. It has been the premier Fast Combat contest for 44 years. At Bladder Grabber Number 1, there was a second event "Trash Can." Dan had managed to get a Jerabee Race car for the prize. The event required the pilot to take off and fly level and then do a wingee into a 55 gallon drum.

### Nighthawk

Dan used to wear a black T-shirt with a silk screened bird feather on it. When I asked him about it he told me about his Combat match with a Nighthawk. He was flying late one evening when a Nighthawk decided to come after his Combat model and engage him in Combat. Dan got a tail cut, actually a feather cut, and won the match. He took the feather and used it as part of the silk screen for his shirt.

### Halloween

Dan loved Halloween. Three stories come to mind. Several years back there were reports of people putting razor blades in apples and handing them out to trick-or-treaters. Dan decided to hand out apples but not before he took a razor and put scratch marks on the apples.

The second story is the year he decided to give out broccoli. The final story is the year Dan took a Jerabee RC car and mounted a carved pumpkin on it and then chased the neighborhood kids around the cul-de-sac.