



## Arrow still flies

BY HUGH WHITTINGTON

Visiting the giant reunion to mark the 25th anniversary of the first flight of the Avro Arrow, one was tempted to view the event from two perspectives. One impression was that a whole generation of Canadians has grown into adulthood without knowing much about the Arrow other than the odd mention in the media. To them, the Arrow was just another airplane which Canada developed sometime after the Second World War. The other impression left one with an ache from thoughts of what continued development of the airplane would—not could—have done not only for the Canadian aircraft manufacturing industry, but for Canadian industry in general.

For those of you too young to remember, the Avro CF-105 Arrow was developed to an RCAF specification for a supersonic fighter/bomber to replace the subsonic Avro CF-100. It took only four years from the time A.V. Roe Ltd. submitted its proposal, to roll the delta-winged giant out of the factory at Malton, Ont., and less than a year after that for the first flight.

And here Canada had an airplane powered by an engine that was heavier and produced less thrust than the Orenda Iroquois engine that was being developed at the same time, but which was not ready when flight testing began. Yet the Arrow, with the wrong engines, exceeded Mach 2 in a shallow climb and its designers were looking for it to reach somewhere between Mach 2 and 3 in level flight at 60,000 feet.

About a year into the flight test program, the Progressive (?) Conservative (!) government of John Diefenbaker cancelled the project. Development costs were skyrocketing, no foreign orders had been taken, and the day of the manned fighter was seen to be over; unmanned missiles were to be the way of the future. And so, 9,000 people at A.V. Roe, 4,000 at Orenda Engines and another 21,000 in sub-contract facilities throughout Canada were thrown out of work, and our aircraft industry was demolished. All record of Arrow development, including the five aircraft that had been built, was ordered destroyed. The pool of engineering and design talent which had built an airplane that was at least 10 years ahead of its time scattered around the globe; in fact, some of those men played a large part in putting an American on the moon in 1969.

That cancellation of the Arrow was a tragedy of the first magnitude is now an his-

toric fact. The Boeing Bomarc missile that Canada bought in its stead was the biggest flop in missile history. Then we bought CF-101s, CF-104s and CF-5s, and if you took the finest feature of each and put it in one airframe, you still wouldn't have an airplane as good as the Arrow was the day it rolled out the factory door in 1957. Only today's Grumman F-14 edges out the Arrow of 1957.

And so, on Saturday, March 26, about 2,000 people arrived at the International Centre, a huge trade show complex adjacent to Toronto International Airport, to pay homage to the greatest technological achievement in Canadian history, an achievement which, for Canada, was akin to the U.S. reaching the moon.

The occasion was the dedication of the Avro Arrow Hall in the Centre, located, ironically, on the site of the old Orenda Engine plant where the Iroquois was developed. Fittingly, the event marked the 25th anniversary of the Arrow's first flight, not the "Black Friday" of the cancellation.

Among the 2,000 people were former Avro employees now living throughout North America. They included Jan Zurkowski, Avro's chief experimental test pilot, test pilots Don Rogers, Jack Woodman and "Spud" Potocki; Jim Floyd, vice-president of engineering and the father of the Arrow; Air Vice-Marshal John Plant, execu-

tive vice-president and general manager; Mike Cooper-Slipper, the only Canadian to fly a Boeing B-47, which served as an Iroquois test bed; and several hundred others from Avro executives to floor laborers. The Arrow had played a very important part of all of their lives.

In a day of symposia splendidly organized by the Canadian Aviation Historical Society, the guiding lights of the project talked, still with some awe, of their roles in the program, and what they developed. After all, they were opening technological doors that were far beyond the state of the art at the time. In 1958, the Arrow was "tomorrow's airplane today."

But the politicians of the day didn't think so. Diefenbaker reportedly hated Avro chairman Crawford Gordon (a Liberal appointee) with a passion (the feeling was said to be mutual), and there was, to be sure, some doubt about the future of manned aircraft in war. And so, the Arrow passed into history without being given an opportunity to prove what it could do.

As former Liberal Cabinet minister Paul Hellyer said at the 25th anniversary ceremonies, cancellation of the Arrow was a "tragedy of tunnel vision and timidity."

That it most definitely was. More's the pity that Canada, which 25 years ago stood alone in aeronautical achievement, will never achieve such greatness again.

