

ASSOCIATION NEWS

Keith Duckworth 10.08.33 – 18.12.05

The Famous Formula One Engine designed by the Duckworth and Costin Duo

Colleen Shilstone Richardson collates the many thoughts and tributes paid to Keith Duckworth upon his death last December.

I only met Keith Duckworth (MECH 1953) once. It was at the Heritage Motor Centre at Gaydon on 22nd June 2002. Within seconds I was spellbound by his charm and he agreed to do an interview for *Imperial College Engineer*. Sadly I left it to late.

He was sitting with his old mate Sir Noel Davies of Ricardo plc – they were in the same year at the City & Guilds College and shared digs together in Clapham with Bill Brown.

This is an extract from Sir Noel's letter to me.

“I first met Keith in 1953 as first year mech.eng.students. Keith, from the RAF, and me from industry. We immediately struck up a friendship. It has lasted for half a century. We were both motorcycle enthusiasts, Keith with his Scott and me with a Triumph. An early memory recalls being caught for speeding on Putney Heath by the police. I was signalled to a lay-by whilst the speed cop chased after Keith before coming back to

book me. It maybe apocryphal – but he never caught up with the ‘flying Squirrel!’

“Keith’s skill and flair as an engineer were very apparent to his classmates, tutors and lecturers alike. He always tackled every problem from first principles, eliminating as far as possible, ‘factors of ignorance’ as he called them. This characteristic and his meticulous attention to detail account for the remarkable reliability displayed by the products of *Cosworth Engineering*.

“Keith was an enthusiastic member of the college motor club and followed me as club captain in 1956, thereby being responsible for the driving and maintenance of Boanerges. Our last full day out together was at Gaydon, when we celebrated Bo’s 100th birthday.

“Keith’s enthusiasm for two-wheeled motoring soon extended to the four-wheeled variety with the acquisition of an Austin 7. This was suitably breathed on with Keith’s ideas on cylinder head and carburettor design. A unique feature was its spare steering wheel, which when waved vigorously out of the driver’s window, caused consternation to other road users! He then had a Lotus 7. Lady passengers had to remove their high-heeled shoes so no damage was done to the stressed skin floor.

“I have observed and appreciated his success both as an engineer and a businessman, from Cosworth’s early beginnings in North London to the impressive facilities in Northampton. I will conclude with a few words

about Keith's character. He had strong views about everything and loved a debate. A conversation with Keith Duckworth, whether it was over a pint of beer or across the office desk, would often turn into a marathon, which could only be brought to a conclusion by you capitulating. His strong sense of humour added to the proceedings and enabled relationships to be maintained!

“The British motor racing industry has lost its most outstanding engineer of the last 50 years, and those who knew him well have lost a loyal and trusted friend.”

The name ‘Cosworth’ was derived from a combination of Duckworth and Costin. Mike Costin and Keith met at Lotus and forged a lifelong friendship, setting up *Cosworth Engineering* in 1958. It became famous for its high-performance automotive engineering, especially for the Ford-Cosworth DFV V8 Formula One engine – a legend in Grand Prix racing circles. A famous winner with this engine was Jim Clark on 4th June 1967 at Zandvoort.

In the early sixties, Duckworth concentrated on designing a series of racing car engines including the SCA F2 power unit. In 1965 he linked up with Ford and produced the FVA F2 and the 3-litre DFV V8 engines. He had perfected the narrow angle/four-valves-per-cylinder/twin-overhead camshaft cylinder head layout, which the rest of the motor industry began to copy. In the eighties, at the age of 55, he passed over the chairmanship

of *Cosworth* to Mike Costin. The business had grown too large for him to control it as closely as he would have liked.

David Keith Duckworth was born in Blackburn into a family in the cotton weaving industry. He was educated at Giggleswick School in the West Riding of North Yorkshire: a private boarding and day school for both boys and girls. Although a small school, it claimed that it gave inspirational teaching that provided a framework for every individual to achieve their potential. He then went on to study engineering at Imperial College, London. He was first married to Ursula Cassal and they had a son and daughter. In 1987 he married Gill Reeve. In December last year Keith entered hospital for an operation to his knee but suffered a heart attack whilst there, and died.

A memorial service was held for him this year on 23rd February at All Saint's Church in Northampton. He was aged 72 when he died.

A website has been instigated in his memory - keithduckworth.co.uk and has been filled with memories of people who revered and loved him.

Ends

Word Count: 830

With his friend, Mike Costin, Keith set up Cosworth Engineering in 1958