

Hugh Clay: 60 years of science

However, this James Bond-like CV is a world away from Hugh Clay's initial career aspirations – he had planned on becoming an accountant to exploit his talent with mathematics.

The 77-year-old grandad from Waterlooville, then a fresh-faced teenager, only applied to the Ministry of Defence (MOD) to gain precious interview practice.

He said: "I had no perception when I was 17 that one day I would be managing major projects for the MOD with a good outcome.

"I've been here a long time. I like the camaraderie, I like the technical challenge, I like the variation so I just like coming to work."

The People Inside: Hugh Clay

Hugh started work shortly after his interview as an apprentice electrical fitter at Portsmouth Dockyard in September 1960 working on the HMS Victorious aircraft carrier.

Five years later he was promoted to be the civilian officer in the Dockyard Calibration Laboratory to work on early electronics and radar.

He then progressed as a Naval Weapon Combat System engineer and an expert in computerised systems on a new generation of ships.

In 1983 he jumped ship and started leading on Submarine Electronic Warfare System on nuclear submarines during the Cold War before helping to develop pioneering periscope technology for Trident class submarines. He was also the first civilian to hold the post of submarine periscope manager which he says is one of his proudest achievements.

In 1995 Hugh started working for the Defence Evaluation and Research Agency (DERA) on Above Water Warfare and was due to retire in 2000 after 40 years of service.

However, he stayed on to be in charge of Surface Defence and Security Operations at the newly established Defence Science and Technology Laboratory (Dstl).

Asked about his career highlights Hugh said:

There are several. One clearly was deployment on a nuclear submarine, which I've done a couple of times. I deployed over to Scandinavia, I also deployed down to Portugal which was quite exciting.

I've worked with the US Marine Corps and the US Navy on developing ammunition rounds and that meant going into the deserts of Arizona

and Nevada on trials and that was quite exceptional. They are people to really admire and I highly enjoyed working with them.

Finally up to date now where I am actually involved in developing equipment that will go into the new generation of fighters.

His various roles have led to him travelling the globe from the Arctic Circle to the South Atlantic to test weapons and defence systems.

In 2015 after 55 years of working on naval projects his career took an upward trajectory with his current role as senior principal project manager looking after air survivability concepts project within air systems in Dstl.

The dad-of-three said:

It is strange not being able to talk to your family about the details of what you do but it doesn't really matter. You can explain it in very broad terms that makes it sound quite exciting – as it really is.

Most of the programmes I've worked on, in fact all of them, they have all been exciting and I've transferred from one project to another and the element of excitement is always there but I have never actually, from the outset, realised how exciting they can be.

In his spare time Hugh plays squash, badminton and golf and enjoys travelling and fishing.

He added:

What makes Dstl unique is this variation of work, is the fact that on any day a unique situation can arise because of conflicts around the world and one has to then rise to those requirements and try and find solutions to help the armed forces.

If there is one project that has taken me back it is the surface warfare project, my previous project. It was a surprise to me being involved with weapons, intimately involved with weapons, small arms, being able to take part in how to use small arms, to actually feel the weight of a gun, how hot it is when you are firing it.

The difficulties the armed forces have. As an engineer scientist it gives you a feeling of how difficult it is to use this equipment. I've been extremely lucky.