

# Handbags and Helicopters - Saving Lives for a Living

*By Captain Nicky Smith*



Picture the scene. It was a dark and stormy night. 150 miles off the East Coast of England, waves were crashing over the side of a small fishing vessel and she was starting to take on water. On the radio, the Coastguard picked up "Mayday, Mayday, Mayday". The scramble bell rang and the duty Search and Rescue helicopter crew were dispatched. It was so windy, we had to wait, sheltered close to the hangar, for a lull between the gusts just to get the rotors started. On the transit out, the situation worsened and we feared that the fishing crew

would have to take to the life raft, which was unlikely to stay upright in these conditions.

When we eventually arrived on scene, it was worse than we'd imagined, with the small boat being tossed from side to side, engine useless. I struggled to hold a stable hover in the gusts and tried not follow the boat's motion, up and down with the waves, as we delivered the winchman and a coastguard pump to the vessel. Then it was back off and try to remain calm whilst the fishing crew and the winchman fought to pump water out of the boat; but, in vain. Suddenly we knew that she was going down and it was race against time to recover all 5 men to the helicopter before they were thrown overboard into the thrashing, foamy sea. We made it, with seconds to spare, as the boat rolled and sank, lost for ever. The fishermen watched in silence from the safety of the helicopter as they realised how close they had come to losing their lives. We flew back, all of us exhausted but elated and voted the poor co-pilot to be the one to tell the Coastguard that their pump was now at the bottom of the North Sea.

All in a day's work for a rescue pilot and just one of many missions that I have been involved in during a career in both Search and Rescue (SAR) and Air Ambulance, spanning 30 years. Basically, every day I get to fly a helicopter, with some amazing crew and paramedics on board, to help people. I even get paid to do it! My job is exciting and can be scary on occasions, but it is massively worthwhile and I believe that it's the best job in the world.



### **Captain Nicky Smith and the Wiltshire Air Ambulance Bell 429 she flies regularly**

So, how did I become a helicopter pilot? I wanted to become a helicopter pilot from the age of 9 and spent most of my childhood at the local airfield watching helicopters flying, making helicopter models and reading about helicopters. But without the internet, I had no idea how to become a pilot. You can't do a GCSE or an A level in flying. At school, my favourite subjects were science, maths and geography and happily it turns out that these were all very useful later on when learning to fly. By the time I left school, I'd decided that I wanted to be a SAR pilot; to combine the thrill of operating the most agile of flying craft with the rewards of saving lives.

I read engineering at Cambridge University and joined the RAF-run club, the University Air Squadron (UAS). With the UAS I started to learn to fly in a single propeller light aircraft and also had my first taste of helicopter flight. It's quite hard getting into the RAF as a pilot, although the UAS is a good route in where you get plenty of support and advice. Aside from the aptitude tests for flying, there are 3 days of interviews, command tasks and a medical. If you're accepted into the RAF, you have to pass officer training and flying training, which takes around 3 years, is pretty tough, long hours and physically demanding, so you have to be highly committed. But it's also 'earn as you learn', a bit like an apprenticeship. Finally, at the grand old age of 23, having achieved my wings, I started flying the big yellow Sea King helicopter as an operational SAR co-pilot.

Through tours in Northumberland, Scotland and North Wales, I became an operational captain and negotiated the roughest seas as well as the most unforgiving mountains across the British Isles and the Falkland Islands, searching for and often rescuing people in distress. It wasn't only people who



needed our services, I've also rescued the odd dog, sheep and even a cow. There have even been a few celebrities to rescue over the years.

Of course, it isn't all glamour though or popping out to winch someone off Snowdon, wave to the tourists on the train, enjoy an ice cream at the hospital whilst you wait for the winchman to hand over the

casualty then back for tea and medals via a "beach patrol sweep". A few months after I qualified, I was flying the first helicopter on scene at the Chinook crash on the Mull of Kintyre. We were faced with a sobering scene of 29 deaths, complete devastation and the absolute frustration of there being nothing that we could do.

Happily, there are many more positive outcomes in SAR flying. Sometimes it is debatable whether the rescue services are really necessary (yes I have honestly been called out to Ben Nevis to a tired woman with a broken finger nail) but mostly as a minimum you made the outcome less unpleasant or uncomfortable for someone and on occasions you honestly know that you've saved someone's life and you can't beat that feeling. Of course, the most difficult rescues from the crew's perspective are never the ones that hit the headlines. I remember being called out late one snowy winter night in Glen Coe to a fallen climber who was trapped and injured at the bottom of a gulley in Buckle Etive Moor. The winch operator carefully talked me into the top of the gulley - which was barely large enough to fit a Sea King - and then I had to maintain that position, battling against the downdraughts, with minimum references provided by just the spot lights, whilst we lowered the winchman using the full length of 250 feet of cable, he secured the casualty and then winched the two of them back in. It was physically exhausting and I felt that I was about to lose it at any second, but we hung on in there, winched the casualty on board and flew left out of the gulley. This was some really demanding flying on the limit of my ability and we saved the guy's life. Not headline grabbing news though, no medals and nobody ever knew how tough it was apart from we crew.

After 3 tours in UK SAR, I was offered a Squadron Command in Cyprus. Firstly, it was off to Northern Ireland to gain some experience of the troop carrying role and learn to fly the Wessex, a vintage helicopter which requires you to be a contortionist and can best be likened to flying a block of flats from the top floor toilet window and then landing on a pair of space hoppers. Most of the flying was a night and permanently weighed down by two guns, body armour and several magazines of ammunition: an interesting 6 months.

At the age of 33, I took command of No 84 Sqn: 60 people and 4 helicopters. As well as flying SAR, we also used the helicopters for everything else from troop carrying to fire fighting, range clearances to prisoner transfers and also flying VIPs. Most fun was winching off cruise ships and blowing all the sun beds away.





Cyprus ended up being quite high profile, partly because we made history on the Squadron with a change of aircraft type to the Griffin, but also because I happened to be the first female Squadron Commander. It seems that there is nothing the general public like more than hearing about females who go into battle and succeed in breaking down gender stereotypes. Just my luck of course that the cameras would always turn up as I landed looking exhausted from a particularly vicious bout of aerial

firefighting, covered in soot and sweat and with a serious case of helmet hair.

In my late 30s, with many happy memories and a raft of hairy flying stories behind me, I decided it was time to settle down and lead a more ordinary life. After flying a desk for a few years putting together technical solutions for helicopter services, I was lured back to the cockpit and a second flying career, once again helping people; this time in the Air Ambulance world. For 10 years, I've been flying air ambulance helicopters, first in East Anglia and now in Wiltshire. We fly by day and also at night, using Night Vision Goggles and powerful lights. We are ready to fly 19 hours a day, 365 days a year and when the bell goes, we scramble in just 2 minutes.

The air ambulance helicopters that I've flown are the Bell 429, known as the 'yellow and green life saving machine' and before that the MacDonnell Douglas 902. The great thing about the MD902 is that it has no tail rotor, so if you do accidentally swing the tail into a bush, there's no harm done. Both of these are single-pilot, twin-engined helicopters that travel at around 180 miles per hour, in a straight line and we don't need to worry about traffic jams and roundabouts. This means we can get to the patient incredibly quickly, provided I can find somewhere to land; that's the interesting part for the pilot. I've landed in some varied places: from Clacton beach on the hottest day of the year, the garden of a stately home, a bridge over a river and lots of motorways, which always leads to long tailbacks and grumpy drivers.



Air Ambulance is a bit different from SAR, where the people who need rescuing often don't also need medical treatment. Air ambulances are there to deliver highly trained doctors and critical care paramedics to seriously ill or injured patients.

We're called to all kinds of emergencies: from road traffic collisions to people falling out of trees or off horses, medical incidents such as cardiac arrests and all sorts of sporting injuries. On average we attend 3 missions a day and the helicopter cabin is like a mini hospital with specialist medical equipment, like the machine that does automatic CPR, a big bag of drugs and even 2 units of blood for transfusions. Some of the oddest emergencies I've attended were a vet kicked by a cow (the cow died but the vet didn't), a man who's leg was trapped in the mechanism of a crane 50m in the air (which had to amputated in situ) and a dodgy tree surgeon who fell down a ladder that was being held by his mate balancing precariously on the back of a low loader.



My shift lasts 10 hours and I work with a crew of 2 medics. Air Ambulances are charities, which means keeping costs down to a minimum, so everyone has lots extra responsibilities. As well as flying as captain of the helicopter, I'm also the navigator, do the daily servicing, refuelling, clean the helicopter and sometimes help out with the patient. When we're not flying, there's lots to do to help the charity like showing round visitors, doing publicity shots, radio interviews and accepting donation cheques.

When the scramble phone rings, the adrenaline starts pumping and the pilot races out to start up the helicopter. We work as crew to find the patient using good old- fashioned map reading (not always easy if they're in a wood or a building), then land and shut the helicopter down; all of this is much more challenging at night. The trouble with landing a helicopter with no notice in a busy place is that the downwash can be a bit of a hazard and sometimes we inadvertently blow things over. Sometimes the pilot gets to help the medics, but if we land in a town, then I stay with the helicopter and end up chatting to

### Air Ambulance Facts

**We have all become used to hearing about the Air Ambulance service but how much do you actually know about it? We look at a few fascinating facts about this exceptional service.**

Air Ambulances fly collectively 70 operations per day – that's around 25,000 call outs per year.

**Medical emergencies count for around 32% of Air Ambulance call outs - the remaining 68% of flights are to assist traumatic injury.**

On average at any given moment there are two Air Ambulances in the air saving lives in the UK.

**The first Air Ambulance helicopter started operations in Cornwall in 1987.**

The UK Air Ambulance Charities are recognised as leaders in pre-hospital care, setting the standard of excellence across the world.

**A single Air Ambulance life saving mission costs on average £2,500, a price that is normally covered via donations from the public.**

The average salary of an Air Ambulance helicopter pilot is around £50,500 per year.

members of the public; I've met some really interesting and wacky people over the years. I've been offered lots of cups of tea, the odd ice cream, the spare chips from the brownies I once showed around and even an occasional glass of wine when I've landed outside a pub, which sadly has to be turned down!

When the medical crew have worked on and stabilized the patient, then the pilots prepares the helicopter to fly the patient to hospital. The medical treatment continues all the way to hospital; one flight I even had a doctor in the cabin doing on-board open heart surgery in a last ditch attempt to save life. Once we've off-loaded the patient and the medics take them into hospital to hand over to the resus team and do their paperwork, the poor old pilot has to don gloves and clear up the mess left behind in the cabin, ready for the next patient. You certainly can't afford to be squeamish!



The thing that I love most about my job, after flying the helicopter obviously, is meeting our patients who come to visit us at the airbase when they're better, sometimes many months later, to tell us their stories. This is such a privilege and can be very emotional.

This is just a canter through my story. I've flown 10 different types of helicopter in an amazing career, with 4000 flying hours and almost the same number of missions to my name. By a quirk of timing I happened to be the UK's first female military helicopter pilot, squadron commander and air ambulance pilot. But really, I've just been the person, at the controls, flying the helicopter and being lucky enough to be part of some really incredible professional teams of people who help those in dire need.

Nowadays, all emergency services helicopters are civilian: SAR is operated by the Coastguard, Police helicopters by the home office and Air Ambulances are charities. There are other routes to these jobs, but all emergency services helicopter pilots need a reasonable level of previous flying experience and the military remains one of the best ways of achieving this. I would certainly recommend military flying in its own right or as a rewarding road to other helicopter flying. As for me, I've been incredibly privileged to have realised my childhood dream, to have worked with some extremely capable and brave individuals and to have had a most fulfilling and rewarding career thus far.



**Captain Nicky Smith**

**Nicky joined the Cambridge UAS in 1986 and passed out of RAF College Cranwell in 1990 with the Sash of Merit for best female cadet. The first woman to qualify as a British military helicopter pilot in 1992, becoming Squadron Leader in 1999. Nicky retired from the RAF in 2006 and taught Mathematics at Felsted School until returning to civilian helicopter operations in 2007. She has flown for the Air Ambulance service since 2011 and has flown for Wiltshire Air Ambulance since 2014.**