Miami Dolphins

The United States Coast Guard's Miami Air Station is the busiest rescue station in the world, averaging 800 SAR cases a year. Its secondary mission of law enforcement ensures that every day is busy. Mike Gaines and Janice Lowe report.

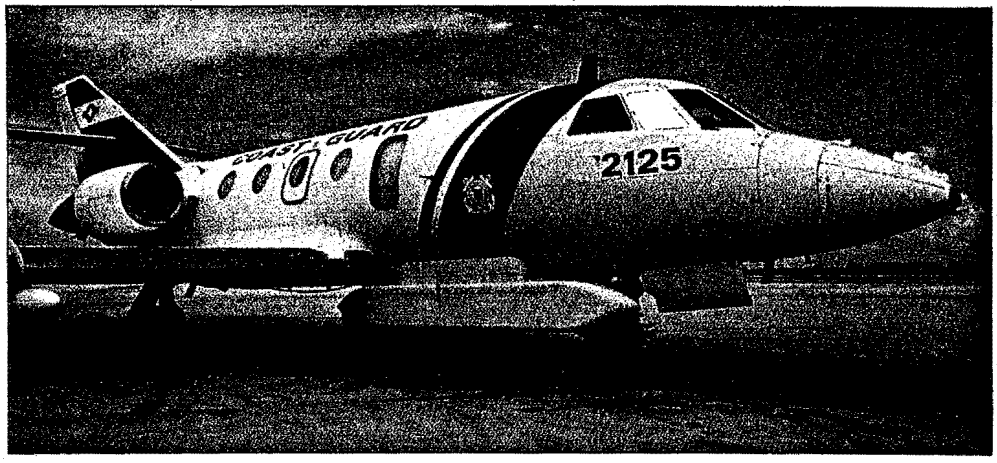
Everywhere you go in Miami there are dolphins. Dolphin logos appear on hats, T-shirts, and bumper stickers proclaiming the virtues of the Miami Dolphins gridiron football team. The other Dolphins are the red, white, and blue Aérospatiale HH-65s of the US Coast Guard's Miami Air Station (MAS) at Opa Locka Airport. Together with eight Dassault Falcons, known in USCG service as the HU-25A Guardian, MAS's nine HH-65 Dolphins are responsible for search and rescue, enforcement of marine laws and treaties (including drug smuggling interdiction), marine environmental protection, and military readiness (in peacetime the USCG is part of the Department of Transportation, in wartime it comes under the Department of Defence).

There are no squadrons within the USCG; all the aircraft at Opa Locka are simply part of MAS, and blank looks greet us at the gate when we ask for directions to "the squadron". This system allows *everyone* on the base to feel part of the action, and the talk is all of "We rescued x people yesterday". Job satisfaction permeates to the humblest member of the unit.

The Commanding Officer at Miami is Capt Kent Ballantyne, whose unit's two main missions are SAR and law enforcement (LE). The latter is chiefly concerned with drug smuggling interdiction, working with the Drugs Enforcement Agency (DEA) and the US Customs Service (USCS). Capt Ballantyne explains the unit's role: "The USCS only has authority in ports of entry, both air and sea, and out to the 12 n.m. limit. On land, and out to 3 n.m., the DEA has responsibility. We are responsible from the shoreline outwards. Of course, that's on paper—we don't necessarily hand over a pursuit at any point. We all work together to beat the smugglers, although there is a healthy rivalry.

"We didn't really get into the LE mission until about 18 months ago, then really it was a combination of two things that led to it. First was the increase in airborne and small-boat smuggling of cocaine, which has a high density value, combined with Vice-President George Bush setting up a

The smart colour scheme of the HH-65 Dolphin is a familiar sight around Miami



Above *Dolphin pre-flight.* **Above right** *Patrolling the downtown seafront.* **Right** *HU-25B Guardian with Slar pod is used in the Aireye role*

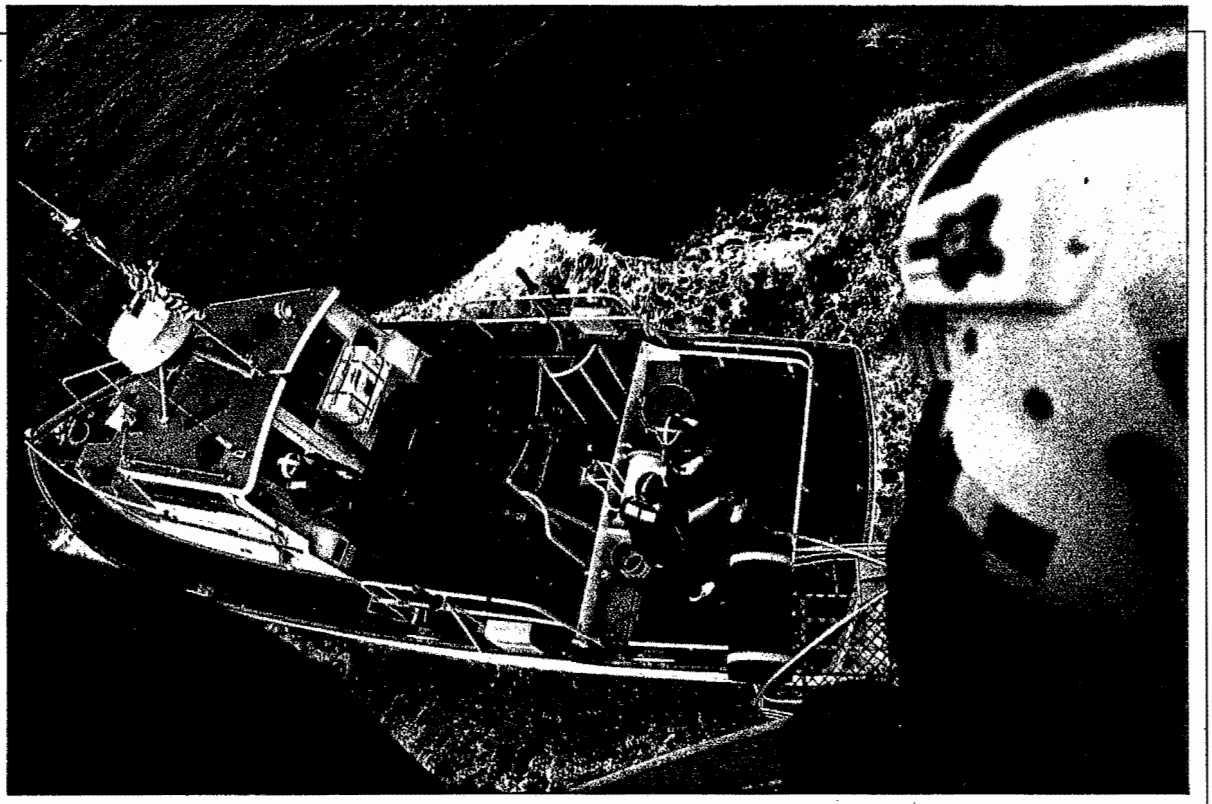
combined anti-drugs task force. Previously the smugglers had been doing mainly marijuana and heroin." Marijuana is bulky and has a comparatively low density value, which meant that bulk smuggling usually involved cargo ships, offloading to small "go-fast" boats offshore. A lot of the bulk-smuggling mother ships were caught by the Coast Guard on the high seas and in port by USCS search teams. With the advent of cocaine as a popular drug the scenario changed. Coke's high density value (about $13,000 a kilo on the street), combined with the increasing success against large-shipment smuggling, led the smugglers, or "bad guys", to change their tactics, using aircraft and 50-70kt-capable boats to bring in the illegal goods.

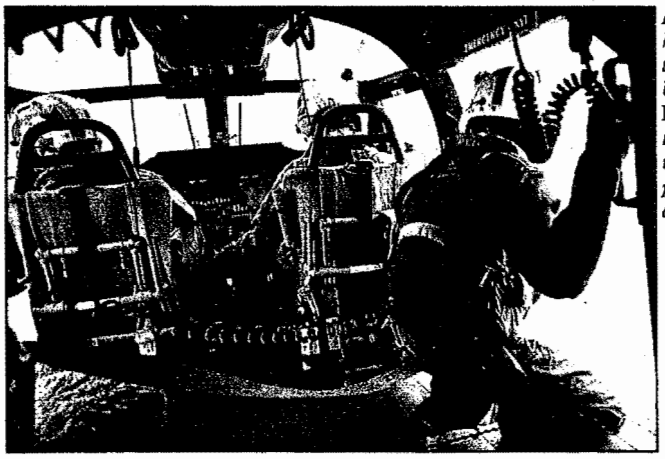
"As soon as we come up with a piece of equipment or a new tactic to catch them, they'll think up a new way of doing it. We've got technology on our side, but don't forget they have a practically unlimited budget *and* they don't have the procurement process to go through. If they want something badly they'll steal it or buy it," says Capt Ballantyne.

The HU-25 Falcons operated from Miami reflect the different roles of the unit. The basic HU-25A is for general offshore surveillance and SAR, and is fitted with a 160 n.m.-range Texas Instruments radar for sea search, plus two large observer's windows and a parachute-drop hatch for dinghies, pumps, and medical kit. The HU-25B is known as the Aireye and has a side-looking radar (Slar) pod mounted on the fuselage, an underwing Texas Instruments Motorola APS-131 RS-18C infrared/ultra-violet line-scanner pod, and active-gated TV (basically, laser-illuminated TV). Both the Slar and IR/UV pods are used to detect oil or chemical spills, while the AGTV allows a ship's name to be read at night without the ship being aware of the aircraft's presence (when throttled back for a covert pass, the HU-25 is quieter than the ship's background noise). This facility is particularly useful on LE surveillance missions. The Aireye also has a 5in vertical/oblique camera.

The C-model Guardian is used for interception of airborne smugglers. Equipped with a Westinghouse APG-66 radar and a Texas Instruments Flir turret, the HU-25C is an interceptor. The mode of operation is to creep up on suspicious radar contacts until in Flir range and then close in the six o'clock position until identification can be made. If the target is confirmed as a bad guy, then the HU-25 will drop back and follow it, either a Coast Guard or, more usually, a USCS helicopter with an armed team on board will be called up to effect an arrest when the smuggler lands.

In US territorial waters the Coast Guard can board any vessel of any nationality to search it for illegal cargo (drugs, arms, or immigrants), and can impound the vessel or arrest its crew for infringements of the law. On the high seas the USCG holds jurisdiction over any US-flagged civilian vessel or any US citizen on a foreign vessel. Foreign vessels may only be boarded if the ship's Master agrees to a "courtesy visit". Masters may (but rarely do) refuse permission to board; in these cases the US State Department will ask the vessel's national





Above *Practising high-line basket transfers with USCG reservists.* **Left** *The state-of-the-art cockpit instruments ease pilot workload considerably.*

state department for permission, and if smuggling is suspected this is usually given. If a vessel is unflagged or its registration papers are not in order, the vessel is regarded as stateless and can be boarded. Foreign vessels in US waters may not be boarded if the ship's Master claims *force majeur*, indicating that his ship was forced into US waters by bad weather. The smugglers know the law as well as the USCG, and are becoming as adept at ignoring it as the Service is at enforcing it.

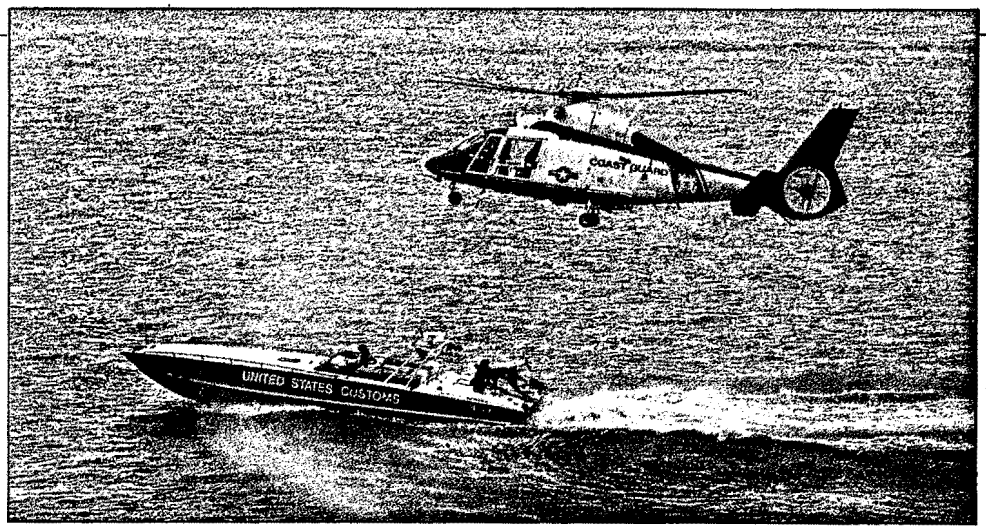
In the Miami area the USCG operates a selection of ships. The Hamilton-class are 378ft high-endurance cutters in Coast Guard parlance. Their helicopter deck (and hover inflight refuelling capability), a 5in gun, two 40mm guns, and three torpedo tubes put them more in the destroyer class, however. Harpoon missiles and the Phalanx gun system will be fitted at the next refit. The Bear-class 270ft medium-endurance cutter carries similar armament but lacks the torpedoes. The 210ft cutter has a 4in gun and a pair of 40mm, plus a helideck, while the surface effect ships (SES) are combination hydrofoil/hovercraft catamarans based at Key West, and are capable of almost 40kt. Completing the picture, 43ft "fast boats" have been designed specifically to combat the smugglers' "go-fast" boats; although the speed is secret, *Flight* suggests this is about 70kt.

The Dolphins are deployed on the three larger ships, operating out of Miami for up to three weeks. Another commitment is to Guantanamo Bay in Cuba, which regularly hosts Miami's Falcons and Dolphins. Each Dolphin will have two pilots and three or four aircrewmen when on board the cutters. Deployment usually lasts for two or three weeks, working on an annual 600 helicopter-day deployment plan. "We use the helo to extend the ship's eyes and as an SAR platform. One of the main tasks is interception of illegal immigrants, mainly from Cuba, Haiti, and the Dominican Republic."

The conditions on the old and leaky boats used by illegal immigrants are horrific, with as many as 300 people crammed into a 30ft boat. Lt Guy McArdle explains: "Some of these boats look like something you'd expect to see at the bottom of your aquarium. When we locate such a boat we home-in the cutter to take them aboard. As often as not the boat is sinking, or the engine has given up, or both. When the cutter comes up we have to tell them to stay still, or they'll all rush to the side and capsize it. They are packed in layers sometimes, and the ones on the bottom layers are usually in a bad way, and then we'll use the helo to get the really bad cases ashore and hospitalised."

Whether the illegal immigrants are allowed to stay in the USA "depends where they come from. Cubans are fleeing a

Communist regime, so they are allowed to stay as political refugees. The Haïtians and Dom Reps are sent back." Another officer chips in: "Not all the Cubans are political refugees. Some are bad guys; real scum in anybody's country." Castro emptied his jails some years ago, putting the erstwhile criminals on boats and packing his troubles off to the USA. Many of these settled in the Miami area and continued their criminal activities on the drugs scene.



One very lucky man overboard is lowered to a USCG fast boat for a ride back to Bimini

The methods used in helicopter SAR are fairly universal, but operating techniques differ from country to country. Halfway through a crewroom coffee an SAR alarm comes in from 7th District HQ in downtown Miami. Details are sketchy: "A man has fallen off a boat in North Bimini harbour". A minute later an amendment comes in. "One person in water (PIW) off North Bimini, exact time and location of going overboard unknown, not wearing a flotation aid when last seen."

The duty crew is already planning its search, amending the plan as more information comes in. Apparently a man and his girlfriend left North Bimini (an island some 30 n.m. east of Miami) on a heading of 280° to return to Miami. The man set the boat's autopilot and the girl went below while the man tidied up on deck. When the girl came up 30min later she was alone.

The crew plots a line 280° from North Bimini, marks where along this line the man could have gone overboard in a 30min period, and adds in the effects of currents, to produce a large, pie-slice-shaped area where he could be. The fast boat sends a description of the PIW: 6ft 2in tall, 225lb, about 28 years old, muscular, fit, and a good swimmer, wearing only shorts.

Used to the speed of UK SAR scrambles, I find the unhurried planning a bit strange. The sea temperature is 78°F to 80°F off Miami, however. After 30min in the sea off the UK you would probably expect to find a corpse: here there is a chance. The duty crew launches and we follow a few minutes later.

The Dolphin's Efis and weather radar come into their own, allowing us to avoid the afternoon thunderstorms as we head for Bimini. In the back of Swordfish 74 the crewman is talking to search boats on Marine VHF and Miami District on HF, while Lt Cdr Randy Meade and Lt Jim Manning are dodging the storms and talking to the other Dolphin, Swordfish 73.

Flying at 130kt, we are burning fuel, but this does reduce our weight to a comfortable level for hovering. The HH-65 is somewhat underpowered in Florida's high temperatures, and an engine failure while hovering means you are in for a swim, but engine failures are rare. The altitude of the search depends on what is being sought and on the visibility. "For a 30ft boat we can fly at 500ft and 120kt; for this guy we'll fly at 200ft and 80kt-90kt," says Randy. Swordfish 73 will be at a different height to give us vertical separation.

We fly down the 280° reciprocal to North Bimini—a long, thin atoll—but see nothing. Our fellow Dolphin has no luck either, flying a creeping line-ahead pattern to the south, in the direction of the local current. By now the man has been in the sea for almost 2hr. We go back out along 280°, while 73 searches inshore in case the PIW is trying to swim to Bimini.

A US Customs Sevice Cessna 404 joins the search, flying at 300ft, fast, and solo. There is little chance that he will see anybody, but every pair of eyes helps. Suddenly 73 calls: "We've got him in sight floating on his back . . . OK, he's waving; we've got a live one." As 73 goes in for the pickup, we turn round and head for the man. The USCG uses float-equipped aluminium baskets to winch up civilians; the winchman stays in the helicopter and directs the pilot. The Dolphin also has an auto-return-to-on-top hover facility for use in bad weather. "We only use the horse collar [strop] to rescue military personnel who are trained in its use," says Randy. "What with the noise and possible language problems and aged or injured civilians the basket is quicker and easier."

Swordfish 73 picks up the survivor, who, after 2hr 30min in the sea, is totally exhausted but otherwise unharmed. He had overbalanced when the boat hit a large wave and was in the water before he could shout. The man is transferred from the helicopter to a USCG fast boat, which takes him into Bimini, while another fast boat escorts his girlfriend in. As the transfer is taking place a new callsign comes up: 47 wants to know how we are doing.

When 47 arrives in a low orbit overhead I glimpse a propeller aircraft with long muffled exhausts, a very long, high-aspect-ratio wing, a Flir ball mounted under the fuselage, fixed gear, and what looks very definitely like one of Mr Schweizer's fins. A polite silence ensues when I ask for details. It *appears* to be a development of the TG-7A motorglider in service with the US Air Force Academy, with the Schweizer model designation of SA2-37A. The aircraft has a 1985 fiscal year serial number, indicating ownership by the military rather than the Coast Guard, and is apparently designated RG-8A, although no-one would confirm this. It appears that not all "stealth" aircraft live in the Nevada Desert.

On the way back Randy again dodges thunderstorms, but a large black cloud hangs over Opa Locka. We can see lightning strikes around the airfield, and decide to stay off Miami Beach until the storm has passed. Meanwhile, Randy shows me some of Dolphin's Efis party tricks. In addition to the usual checklist pages, two pages in the programme are specifically for USCG use. The rendezvous page is for meeting a moving target, usually the mother ship or a target ship. The ship's course plus speed from a point and time is inputted, and the Efis will indicate what heading to fly to intercept and the time this will take at one's present speed. A progress page displays fuel remaining, expressed either in fuel quantity or minutes of endurance, and states the distance that can be flown on what is left: "Time to splash," quips Jim. Another page of considerable use covers search patterns. The pilot can select a point from which to start, keying in a drift factor, and can then select one of a number of patterns to be flown—expanding box, ladder, or multiple clover leaf.

Miami Air Station's comprehensive fleet of aircraft modified according to its various roles is, without doubt, one of the busiest units I have visited. Do the pilots prefer SAR or LE, though? Lt Mark d'Andrea summed it up: "Some like SAR, some like LE, but really they're both saving lives. You pick someone out of the water or you stop some jerk importing drugs that eventually will kill some kid—same thing in the end." ◀