



# FEDERAL AIR MARSHALS:

## TRAINED, ARMED AND EFFECTIVE

The international debate surrounding sky marshal deployment has captivated the world's media. To deploy or not to deploy? Armed or not? A danger to flight safety or a necessary measure to respond to the current threat? Many questions to which **Philip Baum** sought answers when he headed to Atlantic City to look at the American air marshal training programme and interview the programme's Director, **Thomas Quinn**, exclusively for Aviation Security International.

**T**he American air marshal programme started in the late 1960's to stem the tide of hijackings to Cuba. Although initially the task of Treasury Agents, in 1975 it became the remit of

US Customs who, in the mid-1970's, oversaw a programme that had 2,500 marshals flying.

Regarded as a reactive, rather than a preventative, measure, the programme

was wound down. On 11 September 2001 there were only 33 marshals in service. Thomas Quinn, Director of today's Federal Air Marshal Service (FAMS), views things differently: "The absence of hijackings is a measure of

the success of the service. The Federal Air Marshal Service is here to stay".

### Recruitment

One of the first challenges the new agency faced was identifying people suitable for becoming air marshals. "Our primary criteria were to look for people with a law enforcement background. Today they are federal law enforcement officers", says Quinn. "We had 200,000 applicants, many from other law enforcement agencies". The actual number in service today is classified for obvious reasons, yet suffice it to say there are several thousand operating out of 21 field offices around the country.

And they are not all white Anglo-Saxon men either. 4% of the air marshals already in service are female and "we would like to have many more" says Quinn. 20% are from ethnic minorities.

The general public, let alone the industry, needs to realise that "there are more FAMS flying today than ever before. In one month there are more missions being flown than in the entire history of the programme" before 11 September.

Whilst there was criticism of the training programme being shortened to get the marshals in the skies as quickly as possible, Quinn reminds us that the "training was adequate as they were already federal law enforcement officers. The training they needed concentrated on the aviation domain". Given the number of federal air marshals being trained every month, you can't necessarily put them all on a six-month training programme, even though that might be the ideal.

In fact, US air marshals go through an 11-week programme. The first seven weeks are spent in Artesia, New Mexico where they receive their basic law enforcement training. The Phase II training that they undergo in Atlantic City lasts four weeks, during which they

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**Facing page: Federal Air Marshals, 4% of whom are female, are trained to use deadly force only as a last resort.**

study more specialised subjects that I will go into in greater detail later.

### Deployment

Once trained, the federal air marshals (FAMs) are assigned to one of the field offices around the country. From these they are assigned their specific duties to safeguard American flights. "The threat is three-fold", says Quinn, reminding us that the air marshals are not only there to handle hijackers, but also to prevent a criminal act against aviation perpetrated by a criminal or somebody intent on causing the destruction of the aircraft.

Responding to the issue of the service being unable to deploy air marshals on all flights, Quinn says, "There are 25,000 flights per day in the United States. We have had to target critical flights". To do so the FAMS has assessed aircraft vulnerability, intelligence information and the threat level. Certainly flights into and out of the major cities, Quinn describes as "impact locations", using larger aircraft with full fuel loads are going to be at the top of the list for FAM deployment.

Internationally "we work closely with host governments to establish procedures and we only operate within the diplomatic process", says Quinn. Citing Great Britain as an example, he says "we already had dialogue with the Special Branch of the Metropolitan Police" and, in reference to the brouhaha concerning the announcement that the US may demand air marshals be deployed to "selected" flights of foreign carriers operating to the United States, Quinn informs us that "their [the British] personnel were already prepared for this".

### Fears & Firearms

The greatest single fear that Joe Public, let alone some pilots, has in regard to air marshal deployment is the introduction of firearms to the aircraft cabin and the potential catastrophic damage they could do to the aircraft. Quinn is dismissive of this argument: "A small arms round is very unlikely to cause cata-



**In January 2002, Thomas D. Quinn was appointed Deputy Assistant Administrator for Aviation Security Law Enforcement and Director of the Federal Air Marshal Service (FAMS) for the Transportation Security Administration. On December 1, 2003, the FAMS was officially transferred to U.S. Immigration and Customs Enforcement (ICE) within the Department of Homeland Security. Mr. Quinn served with the U.S. Secret Service (USSS) for 20 years until 1989 and in the private industry until January 2002. Within the USSS, he held a variety of positions of increasing management responsibility that ranged from Inspector to Deputy Assistant Director for the Office of Training.**

strophic failure. The flight crews should not fear them being used. There are, however, certain areas of an aircraft you don't want to shoot into", such as the cockpit and the crew, but that is all part and parcel of air marshal training – when and when not to fire.

Federal air marshals are armed with the Sig Sauer .357 (close to a 9mm) double action semi-automatics that can fire 12 rounds. More importantly, however, is the ammunition. "We use jacketed hollow-point rounds that will cause the immediate incapacitation of a human target", says Quinn. They are "not designed to penetrate". Frangible bullets, used by other air marshal services



around the world, are utilised by the FAMS for training purposes only, seeing as they are lead-free and turn to dust on impact with their target; avoiding the effects of both lead poisoning and ricochet effect is obviously a concern in a training environment, let alone on board an aircraft.

Boeing supports Quinn's verdict. Indeed, Boeing's Ron Hinderberger even testified to the US House Sub-Committee on Aviation stating, "the risk of loss of the aircraft due to a stray round from a handgun is very slight", and that "Boeing's commercial service history contains cases of gunfire onboard in-service airplanes, all of which landed safely".

In respect of the risk of a hijacker actually overpowering an air marshal and using their firearm as a hijack tool, Quinn emphasises that FAMS "spend a great deal of time in training on weapon retention". Furthermore, "you will never find a single FAM on a mission; they work in teams". As a result of this, together with their discretion and placement within the aircraft, the risk of their being overpowered is far outweighed by the enhanced security that they actually bring to the flight.

Of course there may be times when a FAM may not wish to fire. I cited the example of a hijacker holding a grenade with the pin pulled. "Getting a grenade through security is much harder than getting a box-cutter through", replies

Quinn. "It's all about risk. You've got to take a chance that it is a dummy grenade". That aside, like flight crews, FAMS are trained in concepts such as Least Risk Bomb Locations, so they know where a grenade exploding is going to have the most impact. In any case "FAMS will only fire as a last resort".

### **Disruptive Passengers**

Ultimately it's all down to training and FAMS train "on a whole host of scenarios where they are not supposed to respond", on scenarios where "one member of the team responds" and suchlike. In respect of involvement in disruptive passenger incidents, they do not respond unless a felony of interference with flight crew has occurred. "In other words", says Quinn, "when it moves from the verbal to the physical".

### **Information Sharing**

As an advocate of passenger profiling, in the form of behavioural analysis, I was compelled to ask Quinn how much this formed part of the FAMS training. "We are not engaged in profiling, but", he said reassuringly, "we have developed a tactical information sharing system" that enables the FAMS to record suspicious behaviour on one of the wireless PDAs (Personal Digital Assistant) with which they are each issued. "The criminal must conduct surveillance. That's when they are at their most vulnerable. We train our FAMS to recognise and report such behaviour". With this approach information can be shared amongst FAMS and suspicious sequences of events can be better identified.

On the PDA, the FAM can record that on flight X, or in airport Y, they observed a person acting in a suspicious manner. The FAM can then select from a lengthy menu of topics considered suspicious, including: reading suspicious literature, requesting information on the cockpit, unusual dress for climate, in the lavatory

for a long period of time, wouldn't disembark on time, to name but a few. "Their responsibility is much broader than taking a seat on an aircraft".

The programme is known in-house as the Surveillance Detection System (SDS). They look for trends and patterns. They are trained to follow their gut feeling. The PDA is simply a way of ensuring that their colleagues can benefit from the intelligence they have acquired. The next generation of PDAs are likely to have picture-taking capability, whilst the current ones can already receive images if new threat information becomes available. Indeed, the programme has already assisted in the arrest of a Georgia murderer, who was identified at an airport by a FAM.

The SDS is not a new concept. It was actually developed for the Salt Lake City Olympics and sold to the Secret Service. It has simply been adapted to the needs of the FAMS. Hopefully, such a system will, one day, be utilised by other security agencies tasked with screening passengers, let alone aircrew.

### **Atlantic City**

Reassured by the principles behind the programme as enunciated by Thomas Quinn, I moved on to view the realities of training to be a FAM at their state-of-the-art training facilities in Atlantic City.

On a single day, I managed to get a snapshot of the four weeks that FAMS spend on their Phase II training once they transfer from Artesia, New Mexico.

The first week addresses topics such as Law Enforcement, Use of Force, International Law and implementation of the Surveillance Detection System; in effect, the more theoretical subjects. Prospective FAMS also study subjects better associated with cabin crew training. "The aircraft cabin is, after all, their office", says Special Agent-in-Charge,

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**Above: The real thing. Delta donated an L-1011 to the FAMS for training purposes.**



**Top: The FAMS service weapon, the Sig Sauer point 357 double action semi-automatic**

**Bottom: Atlantic City residents act as role players in hijack exercises**

Robert E. Clark. Accordingly "they learn about fire suppression, least risk bomb location and emergency evacuation". The latter is taught using door simulators replicating the doors of Boeing and Airbus aircraft types on which the FAM may be deployed. Cockpit familiarisation is also part of the syllabus; they are not trained to be pilots, but use of the radio, transponder and PA system, together with a basic knowledge of key controls locations is considered essential. Finally, they undergo physical training and learn about self-care, which incorporates nutrition, coping with time zones and maintaining physical fitness in hotels. The Atlantic City set-up has one of the most sophisticated gymnasiums I have ever seen and, naturally, even once the FAM has qualified, there is an expectation that a high degree of physical fitness will be maintained.

local Atlantic City residents contracted to play the roles of passengers day in, day out. Safety is of paramount importance, so whilst dressed casually, the volunteers don headgear when firearm simulations (simulated gunfire) are utilised.

Target practice is carried out on an outdoor range in all weathers (the day I visited, temperatures were well below zero degrees on whichever scale you use), with FAM trainees competing against each other to ensure accuracy and effectiveness under pressurised conditions. My own firearm skills, which I was afforded the opportunity of testing, are certainly not worth reporting - must have been the weather!!!

FAMs also practice in a shoot-house, where they are taught to make instinctive decisions whilst distinguishing between the good guys and bad guys. The house is configured like a wide-bodied aircraft and moving targets move up and down the aisles at random; the FAM is expected to shoot the "bad" targets until they drop, whilst avoiding injuring the "good" ones.

In week two, operational subjects are addressed. "We teach them to crawl, then walk, then run", says Clark. Defensive measures, specific FAM tactics and use of firearms are all studied...until the candidate either gets it right or drops out.

For the final two weeks, it's a case of practice, practice, practice. And the Atlantic City is well equipped to provide an almost ideal training environment...

Scenarios are enacted in a variety of cabin configurations recreated within the training centre, with

An aircraft tactical pistol course is conducted in an indoor shooting range, whereby FAMs are taught to hit their target (a silhouette) from a range of different positions: seated, standing over the seat, moving, from the right aisle and the left aisle etc. The FAMs ability to draw their firearm from its holster, centre on the target, manage firearm recoil (demonstrated by being able to fire six shots in three seconds) and reload is all assessed by the trainers who, themselves, also fly as air marshals.

The *piece de resistance* comes at the end when FAMs are taken aboard an L-1011, donated to the FAMS by Delta Airlines, and run through a wide range of different scenarios. Local residents are again brought in as the role players, whilst the FAM trainees end their training in the surroundings of a genuine aircraft cabin. Never underestimate the importance of such training aids. "We are extremely grateful to Delta Airlines for providing us with this capability to enhance the training programme", says Clark.

Whilst eleven weeks training may be considered by some to be on the short side, with some programmes in other parts of the world being six months in length, to truly evaluate a programme one must look at the training environment. The Atlantic City set-up is extremely impressive, with no expense being spared on the acquisition of the appropriate training tools. FAMs leave the course qualified, yet their training continues. "They receive five days training at their field offices every quarter", says Quinn. That's 20 days recurrent training per annum.

I left Atlantic City further convinced of the need for air marshal programmes and reassured that the training was not limited to use of deadly force at 33,000 feet. In fact, it's just the opposite. Federal air marshals are trained to use deadly force only as a last resort. Their presence on passenger jets, as federal law enforcement officers, should reassure all those who take to the skies, be it for business, pleasure or as aircrew.