

cabin *safety* update



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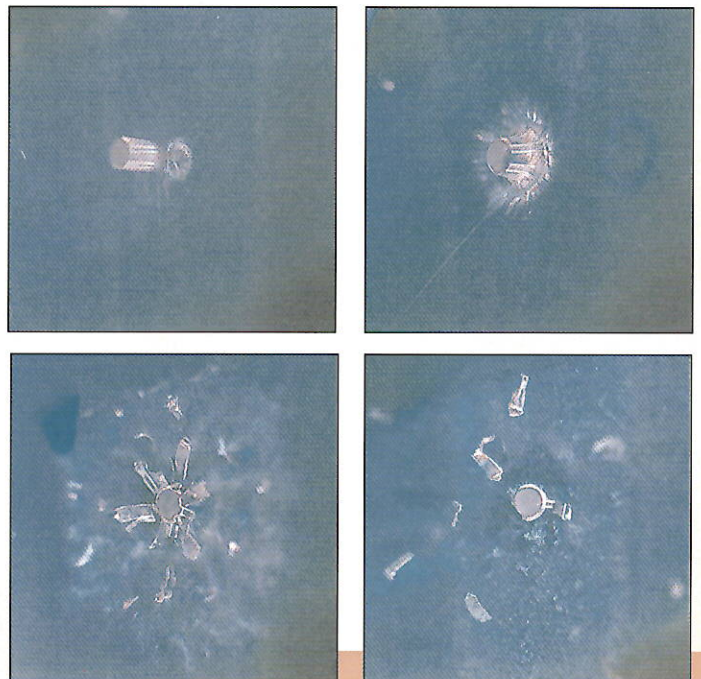
When 19 men hijacked four different jets on September 11th and flew them into densely populated areas, the aviation security industry was turned on its head. For years there had been an ever-increasing level of threat denial by airlines and an over reliance on technologies that would only be able to assist in the identification of certain hazardous items. By September 12th, the question was how to prevent the next suicidal hijacker. Solutions mooted were numerous and one of the most controversial was the possibility of deploying sky marshals on each and every flight. **Philip Baum** looks at this last line of defence.

Determining what level of security checks passengers are expected to go through is a balancing act. On one hand we have to face the demands of a rapidly increasing number of travellers who demand an efficient, hassle-free and quick airport experience, whilst on the other hand we know that we are looking for threatening needles in the proverbial haystack and a huge one too, that will only be identified through detailed scrutiny.

PASSENGER SCREENING

Most governments have accepted that some form of passenger screening is essential, on both domestic and international flights, yet have opted for solutions that have some limited detection capability whilst offering considerable deterrent value. The X-ray machine and archway detector have come to symbolise aviation security despite their numerous limitations. They offer some reassurance to passengers and even better-informed crew members mistakenly believe that such technologies have eradicated any threat.

Post-September 11th new technologies are being revealed on a daily basis. Biometric solutions, advances in CT-scanning, polygraph analysis, explosive detection systems...and the list goes on. The spotlight has once again turned in the direction of Israel whose security system is acclaimed globally as being the best available. Theirs is a system based on profiling, which combines behavioural analysis with passenger interrogation. Supporters of profiling - and probably its opponents too - view the system as being the most effective way of identifying a passenger who poses a threat to a flight. The numbers of



Here can be seen four stages of a frangible bullet impacting its target. Remington, based in the United States, is one of the largest suppliers of such technology.

passengers flying elsewhere in the world, however, make the Israeli system somewhat impractical to implement in terms of airport size and passenger holding times whilst its reputation as being non-conducive to a spirit of customer service is also problematic.

Why discuss the ultimate screening technique in an article on sky marshals? The answer is easy. For all the faith that the Israelis place in the profiling system, even they do not see it as a total solution. On board every El Al flight there is also a last line of defence – sky marshals.

While many still seek to develop technologies that will only either identify hijackers with weapons or explosives or those whose identity is already known by the authorities, perhaps we should remember that many terrorists are not known, and therefore not identifiable by biometric solutions or computer databases, and many weapons are not detectable. Many governments have introduced policies that lack common sense, such as the introduction of bans on metal cutlery (whilst allowing glassware and duty free!) and the confiscation of nail clippers. We need to remember that a determined individual can hijack an aircraft with his bare hands and the only way to then protect the crew is by the presence of highly trained inflight security professionals.

As much as I support the concept of sky marshal deployment on all flights, I would rather no such programme than a half-hearted attempt to adopt such a policy. In other words, either it is done properly or not at all. And properly, I'm afraid, is costly.

WHO ARE THE SKY MARSHALS?

Sky marshals should be government agents deployed at government expense on all carriers. They are plain-clothed, pose as passengers and will not be identifiable during the flight. The agents need to be highly trained individuals with a military background and experienced in close-quarters combat skills. The number deployed on any given flight will depend on the aircraft-type, however as a minimum there is a need for one agent per aircraft cabin. On larger aircraft, teams of eight or more could be required.

WEAPONRY

A sky marshal's prime objective is to neutralise - meaning kill if necessary - any passenger, or crew member, who is endangering the flight by their actions. They are armed with low calibre guns that fire frangible bullets that limit the risk of critically damaging the aircraft itself should shots be fired. A frangible bullet delivers a debilitating blow to a criminal while significantly reducing the threat of over-penetration or ricochet. The bullets usually have a soft plastic tip, which sits in front of a load of very fine shot, which cannot break through the interior panels of a commercial aircraft. They are very accurate at close range, and ideal for the closed combat environment of an aircraft cabin.

As far as the hijacker is concerned, if shot in the head by a frangible bullet, death is probable, whereas a shot elsewhere

on the body will inflict significant local injury. However, before any shot is fired the sky marshal will have to consider whether eliminating the hijacker could pose other threats to the flight. For example, would such action result in other hijackers on board carrying out their threats? Or, if the hijacker was armed with grenades, might the actual threat posed by a dropped grenade be more significant than the perceived threat posed by a hijacker?

TRAINING

Such a decision-making process is part of the intense training that sky marshals will go through before taking to the skies. Most courses last between three and six months and are designed as military-style courses. These are not courses in the management of air rage incidents where diffusion techniques might be the order of the day. Indeed, the sky marshal will not intervene in an air rage incident unless the actual security of the flight is endangered. It would otherwise be all-too-easy for a hijack team to start their plan of action with an act of disruptive behaviour designed to identify the whereabouts of the sky marshals on board a specific flight.

That said, there is a fine line between the actions of a disruptive passenger and the actions of a hijacker. There have been a number of incidents where passengers have entered or tried to enter cockpits with the aim of attacking crew members or seizing the aircraft's controls.

While flight attendants will be trained how to calm an individual, sky marshals are specifically trained to be aggressive. When they act, they act without restraint and without consideration as to the hijackers' well-being.

Other aspects of training include the familiarisation with different aircraft types. The sky marshal needs to feel totally 'at home' in the aircraft cabin. He (and sky marshals are usually male) will know escape routes, sensitive points of the fuselage, blind points and be capable of manoeuvring himself at speed within the confines of the cabin.

INFLIGHT PROCEDURE

Generally the crew will be aware as to who the sky marshals are on-board an aircraft. Indeed it is important that a procedure is developed to pass information about suspect passengers to the sky marshal inflight. Ground security personnel will have advised the sky marshals about passengers that they have concerns about so that they can be kept under constant surveillance or even have a sky marshal seated next to them.

Although the crew may know the sky marshals, it is generally advisable that contact be kept to an absolute minimum. On-board, excessive communication can highlight the sky marshals' whereabouts. On layovers, over familiarity and the development of friendships between sky marshals and crew members is also limited as it could effect the way each may act during an incident.

In the event of hijackers successfully taking over an aircraft without intervention, the sky marshals will keep a low profile

and attempt to be perceived as one of the passengers. Their role then changes; naturally they will continue to look for opportunities to overpower the hijackers, but, granted a commando assault on the aircraft, they may be able to facilitate hijacker identification and neutralisation, as well as passenger evacuation

The sky marshals' task usually ends once an aircraft has landed and all passengers have disembarked. If overseas, the sky marshals' weapons will normally be kept on board as they will not be authorised to carry them on foreign soil. This also facilitates their process through passenger/crew screening points.

OBJECTIONS

The main objections to sky marshal deployment are the cost of the programme and the known introduction of arms to a sterile area that could then be used to assist hijackers in their actions.

In terms of cost, it is expensive. Then again, the costs of September 11th are incalculable. Furthermore, we must remind ourselves why we have cabin crew on flights. They are there primarily for our safety. If we can afford them, should we not be able to afford sky marshals?

The issue of sky marshals' weapons falling into the wrong hands is resolved by earlier remarks about the programme. If

there is going to be a sky marshal programme, it must be done properly. If a single sky marshal is going to be deployed on a Boeing 747, then the fears are justified...and the programme has only deterrent value. If poorly trained individuals are to be utilised, again the risks are justified and the programme pointless.

This is also an argument against the arming of crew members. The pilots are professional fliers rather than security professionals. The only people that could be armed are combat trained government agents. Private security guards can, at most, supplement the cabin crew in providing restraint resource, yet should never be armed or play the role of sky marshal.

Considering the quality of background screening many security companies perform when recruiting staff, I am loathe to even advise their deployment in such an unarmed capacity.

Sky marshals have successfully prevented hijacks. The most famous example was the disarming of Leila Khaled who attempted to hijack an El Al flight en route from Amsterdam to New York in 1970. She herself recognises that her mission failed due to sky marshal deployment, whilst her colleagues who hijacked Pan Am, Swissair and TWA flights the same day were successful.

Much more recently sky marshals on both a Royal Jordanian flight and on a Xinhua Airlines flight managed to overpower hijackers.

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China has an effective sky marshal programme in place, as has many other countries in the Asia Pacific region. India has also implemented a sky marshal programme in the aftermath of the hijacking of Indian Airlines IC 814 to Qandahar in 1999.

UNITED STATES & SEPTEMBER 11TH

In the United States, the Sky Marshal Program began in 1968 in an attempt to reduce the number of hijackings to and from Cuba. The current Federal Air Marshal Program was created after the hijacking of TWA 847 in June 1985, an incident that resulted in a 17-day hostage ordeal. During the 1990's the programme was gradually wound down, until last year....

The FAA is now actively recruiting US citizens under 40 years of age on salaries between \$35,100 and \$80,800. In addition, positions are covered by the 25% Law Enforcement Availability Pay. (You can apply online at: <http://jobs.faa.gov/>)

The Federal Air Marshal tactical training facility and operational headquarters is located in Atlantic City, New Jersey. Facilities include three different outdoor ranges with moving targets, a 360-degree live-fire shoot-house configured as both a narrow-body and a wide-body aircraft with computer-controlled targets and a bullet-proof observation platform, an indoor laser disc 'judgement pistol shooting' interactive training room and a close-quarters countermeasures/personal defence training room with protective equipment and dummies. The programme also uses an inactive five-story air traffic control tower, a retired Boeing 727 narrow-body aircraft and a retired Lockheed L-1011 wide-body aircraft for on-board exercises, a modern classroom, a state-of-the-art fitness facility, and an operations centre capable of secure communications worldwide.

INTERNATIONAL RESPONSE

Whilst America is going down the sky marshal route, others are faltering. The British government has, as the September 11th atrocities start to become part of history, given in to pressure from the industry. The British aim is to tackle the problem on the ground. A laudable objective were it achievable, yet a decision that I fear will come back to haunt them.

Australia, on the other hand, is implementing a sky marshal programme on certain international and many domestic

flights. In Germany, men from the anti-terror squad GSG-9 have been flying on board Lufthansa flights. Royal Jordanian has, for years, carried sky marshals....and has had to use them too. Effective programmes are in place in China, and elsewhere in the Far East and Middle East. India too instituted a sky marshal programme in the aftermath of the hijacking of Indian Airlines IC 814 to Qandahar in 1999.

CONCLUSION

Granted the size of the aviation industry, it is impractical to deploy sky marshals on all flights. The sheer numbers involved create a problem themselves – if you need to recruit tens of thousands of agents, you are likely to take on board a few bad apples too. Whilst El Al can be proud of their sky marshal programme, and their other security procedures, the reality is that the Israeli airline is a relatively small carrier, facing a high threat and where security is the first item on the customer service menu.

Sky marshals are, however, the only practical solution to preventing a September 11th-style incident. There was then, and is now, no technology that could do that job better.

The question then is on which flights to deploy sky marshals. The easy answer is high-risk flights, but then those flights hijacked on September 11th would not have fallen into that category. Perhaps the answer is a sufficient number of random flights as well as the higher risk routes. Defining 'sufficient' is again problematic. Yet for a sky marshal programme to be effective as both a practical and deterrent measure, the general public needs to know that there is a fair chance that there will be sky marshals on their flight, be it a wide-bodied aircraft or a commuter jet; be it operating to a country connected with terrorist activity or while making a 30-minute domestic flight; be it during a period of increased threat or when concerns are reduced.

It has long been my belief that as terrorism is not the fault of the airlines, and is a political issue, the financial burden of security should not be placed on the airlines' shoulders. The airlines' responsibility, however, is to lobby government for the security they are owed. After all, September 11th proved that a failure of aviation security can also have dire consequences for the non-travelling public on the ground.

The author is Editor of Aviation Security International and Managing Director of Green Light Limited, specialist providers of training in Hijack Management for aircrew.