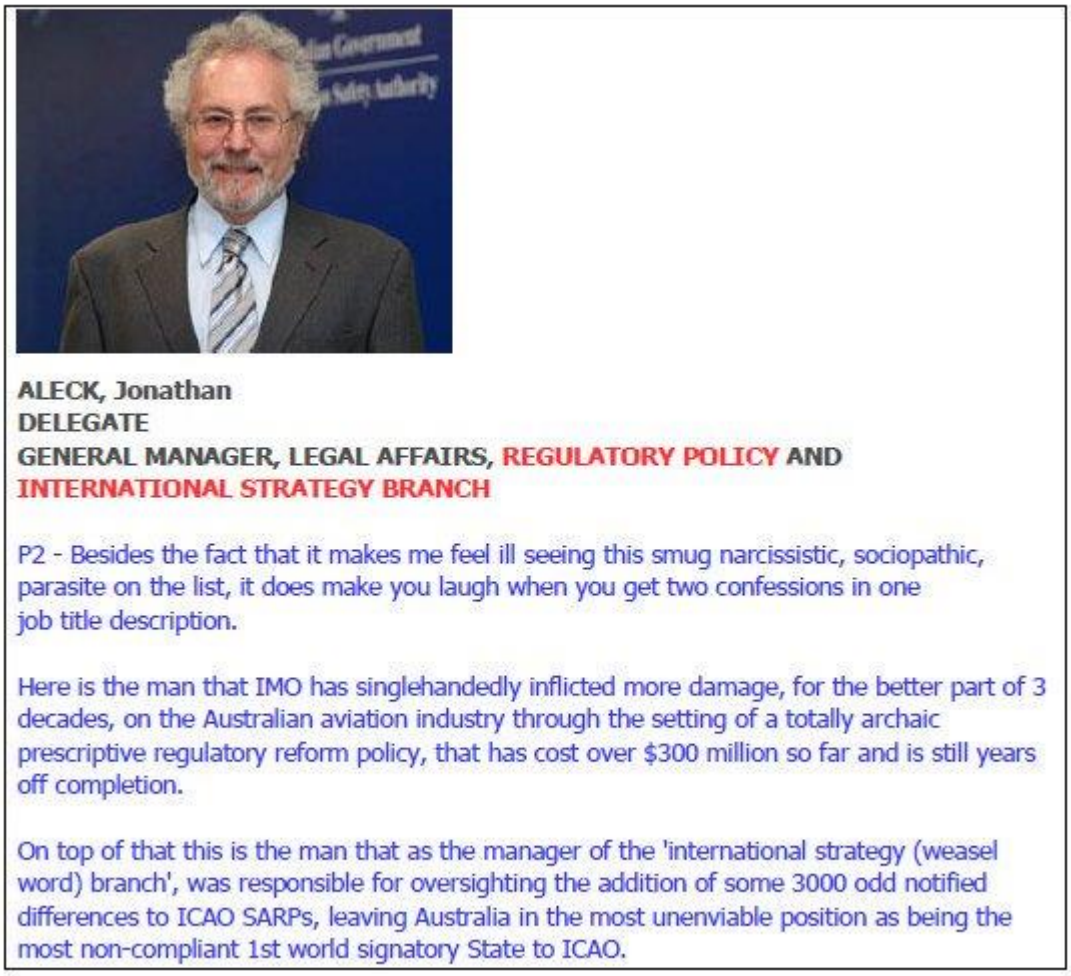

Potted history of Australian aviation safety regulation over 3 decades – Lead Balloon

The system of aviation safety regulation in Australia was originally based on the system of maritime safety regulation in Australia. Indeed, things like the 'rules of the air' - who gives way to whom in the air, what side to overtake on and the colours of aircraft Nav lights originate from the maritime collision regulations.

The system of maritime safety regulation in Australia was and continues to be, in essence, implemented through the Navigation Act and subordinate legislation under that Act, in the form of Navigation Regulations and Marine Orders. So, when aviation became a 'thing' the Commonwealth naturally passed the Air Navigation Act and authorised the making of subordinate legislation under that Act, in the form of Air Navigation Regulations and Air Navigation Orders. Flying machines and floating machines are just flying machines and floating machines.

Although I'm temporarily jumping forward to the present day, it's worth doing so to note a couple of fundamental differences between the contexts of the two systems, which differences have resulted in what is now the most convoluted and complex aviation safety regulatory regime on the planet. (Don't take my word for that: Talk to people who've flown in other countries. Print off the Civil Aviation Act, Civil Aviation Regulations, Civil Aviation Safety Regulations, Civil Aviation Orders,

Exemptions that aren't done by Civil Aviation Order, Manuals of Standards and see if you can work out what it means. The people who say the system of aviation safety regulation in Australia is not that bad are, almost invariably, people who have little-to-no experience in other countries or make money out of building and running the system and who, therefore, make money out of ever-more complexity.)

One of the fundamental differences is that the maritime safety regulator is bound to perform its functions in a manner consistent with Australia's obligations under agreements with other countries. There are lots (and lots) of international conventions relating to maritime activities. SOLAS, STCW, MARPOL, Tonnage, COLREGS.... The aviation safety regulator is also bound to perform its functions in a manner consistent with the obligations of Australia under international agreements. However, the ICAO Convention is practically the only one relevant to aviation safety regulation. Further, and fundamentally importantly, the only obligation of Australia under ICAO is to notify of differences between SARPS and the domestic requirements in Australia. This is an open door for complicators and 'safety' zealots to come up with bright ideas to make aviation in Australia 'safe'.

In short, the maritime safety regulator in Australia just gets on and does stuff in accordance with the international conventions whereas the aviation safety regulator in Australia spends its days cogitating over whether it knows better than what's in ICAO SARPS. Lucrative for the cogitators; not so the regulated.

A related issue to the first is that the international conventions relevant to maritime activities specify pretty strict and limited circumstances in which exemptions may be granted. Exemptions are exceptional. However, exemptions are an essential part of the Heath Robertson contraption that is the Australian air safety regulatory regime. One of the most important questions that must be ascertained when flying in Australia is not so much "with what laws must I comply?" but rather "from what laws am I am exempt?"

The second fundamental difference has its basis in human psychology and a well-known and entirely uncontroversial phenomenon called "cognitive bias". There are many forms of cognitive bias, but one is the human propensity to overestimate the probabilities of awful events, resulting in damaging rather than beneficial mitigation of those risks. Air crashes are such events. Germanwings is the most awful of awful events.

Each accident results in ever-more complex rules and restrictions, even if there is no causal and cost-effective positive connection between the rules and restrictions and the risk, because humans *perceive* the probabilities of air accidents to be far higher than they objectively are, and accordingly clamour for or tolerate responses that are more costly than is justified by the objective risk, or worse, are counter-productive. For example, there will be no limit to the individual rights sacrificed in the name of prevention of another Germanwings. Every pilot will be, presumptively, suicidal, and any hint of a problem will be considered a potential disaster, just to be "safe". And few if any pilots will be willing to raise any issue that might be construed as a mental health problem.

Anyway, back to the evolution of the aviation safety regulatory system...

It is important to bear in mind the difference between the safety regulation of aviation on the one hand and the economic and international relationship aspects of aviation on the other. In principle, anyone who meets the safety standards should be able to fly wherever they like. However, there are

economic and diplomatic and other consequences of letting people fly wherever they like, carrying whatever cargo and passengers they like. So there is regulation of these aspects of aviation as well.

Because of this difference, the safety regulatory and air traffic/flight services provisions of the Air Navigation Act, Regulations and Orders were 'split off' to become the Civil Aviation Act and CARs and CAOs, effective 1988. The licensing of scheduled international air services to and from and within Australia remained (and remains) regulated by the Air Navigation Act for economic and international relations reasons, and the safety of aviation within Australia became regulated by the Civil Aviation Act and subordinate legislation under that Act. The Civil Aviation Authority was also created by that Act. Note that at this point the air traffic control/airservices function was also part of the Civil Aviation Authority.

Then followed a number of controversies (about which volumes could be written) that resulted in the CAA being 'split' into the Civil Aviation Safety Authority and Airservices Australia in 1995. The theory of this split was that CASA would focus only on safety regulation and Air Services would focus only on the provision of air navigation-related services. The practical reality has been different, but the reasons (about which volumes could also be written) are not necessary to delve into for your purposes.

Although the desirability (some said the necessity) for reform of the aviation safety regulatory regime had been discussed and agreed in the abstract and some work done before 1995, the split of the CAA into CASA and Air Services, and the context in which that happened, provided impetus for a concerted effort to 'reform' and 'simplify' the aviation safety regulatory regime.

What was *supposed* to happen was that the Civil Aviation Regulations 1988 were to be replaced by the Civil Aviation Safety Regulations 1998, and that because the latter were going to be simple and outcomes-based there would be no need for CAOs or exemptions.

Over 20 years and a conservatively-estimated $200 million later, the outcome is a Heath Robinson contraption comprising the Civil Aviation Act, Civil Aviation Regulations, Civil Aviation Safety Regulations, Civil Aviation Orders, Manuals of Standards and Exemptions that, along with directions and other instruments, is many time the size and complexity of what it was supposed to replaced. Appallingly, the process is only about 30 to 40% complete. Even more appallingly, it's never going to end. There is no longer the corporate competence to get it done - too many complicators and too few simplifiers involved.

Most appallingly, all of this has produced no causally measurable improvement in aviation safety that is justified by the price paid - not only in dollars for the 'reform' program itself but in the destruction of the aviation industry (though it must be acknowledged that 'security' over-kill and the sell-off of airports and aerodromes and their conversion into monopoly cash-cows and shopping centres have substantially contributed as well).

On the 'hierarchy', the Civil Aviation Act contains laws with which you must comply. That Act also contains a power to make subordinate legislation. The Civil Aviation Regulations 1988 and the Civil Aviation Safety Regulation 1998 are subordinate legislation containing laws with which you must comply. The distribution of subject matters between the 1988 and 1998 regulations has no connection with any coherent criterion. It's just the random consequence of where the regulatory 'reform' process is up to. Remember: It's all supposed to end up in the 1998 regulations in 1998, no

2005, no 2012 no.... (As I said above, it's never going to end.). Some Civil Aviation Order impose conditions on AOCs and other are notifications of exercises of powers in the Act or regulations - for example, the CAO 95 series contains exemptions from compliance with the regulations. Manuals of Standards contain detail (lots of detail) about specifics regulatory requirements in the regulations. Then there's a bunch of ad hoc exemptions, directions, approvals etc.

On the specific question of the AIP, the AIP is simply a compendium of various separate bits of information and exercises of separate regulatory powers. For example, the AIP contains the outcome of decisions by CASA in the exercise of runway width powers and the power to decide that the circuit direction will be right hand rather than the default left at a particular aerodrome. It also contains runway diagrams and aerodrome data. Charts... Immigration requirements.... It's supposed to be the 'idiot's guide to flying to, within and from Australia'. There is no obligation to comply with the AIP as such. Rather, where a specific provision of AIP reflects a law or the exercise of some regulatory power, failure to comply with that provision will be an offence against the related law or regulatory power.

(That's why I occasionally say "so what" in response to someone saying "AIP para X says" or "Jepps para y" says. Ultimately, the 'rule' in AIP or Jepps someone is quoting is not a rule unless it reflects a law or the exercise of a statutory power. A recent real example was purported restrictions published in ERSA on the use of airspace around Mildura. The restrictions had no basis in law and were therefore removed.)