



Odin Leirvåg  
Chairman of the Board

Welcoming Remarks at the opening of Solakonferansen 2019.

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Good morning everyone!

As Chairman of the Board of Stiftelsen Solakonferansen (The Sola Conference Foundation), I have the pleasure of welcoming you all to Solakonferansen 2019 (The Sola Conference 2019). I welcome both former and new attendees. Welcome to lecturers, sponsors, master students and to the press.

It is worth reminding us, that this year, it is exactly 100 years since the world's first multilateral aviation conference – ending with a signed agreement - took place in the wake of the World War One.

In Paris, the sovereignty of state airspace was recognized. In addition, standards for airworthiness and certification of competency for crewmembers were developed. But perhaps the most important passage was the definition of an aircraft.

The definition included various flying devices. A criterion was whether the machine could derive support in reaction of the air.

It is also a curiosity that in the year 1900, three years before the Wright brothers flew for the first time, a French lawyer proposed a code of air navigation. One of a few examples that legislative work was ahead of technological innovation.

The next big and ground-breaking aviation conference took place 75 years ago. In 1944, in Chicago, in the final phase of World War Two. That conference built on the Paris Conference and gave the freedoms of air and laid the foundation for ICAO.

While the wars showed the military importance of air power, the period between the wars demonstrated the enormous potential for civil aviation, both for economic and political purposes.

Aviation had become a global importance. European states started to use aviation as communication with their colonies and the Americans began to cross the Pacific and the Atlantic with airplanes.

Responding to a British initiative, allied and neutral states met. The goal was to develop an international agreement to ensure that civil aviation developed in a safe and orderly manner. Also, that the international air transport services were established on basis of equality of opportunity and operated soundly and economically.

USA hoped to steer the negotiations towards affirming a free market and open competition in aviation services. For the benefit of American industry.

UK proposed an international organization to coordinate air transport to apportion the worlds air routes and to decide on tariffs.

Australia proposed a most imaginative solution; the creation of a single world airline.

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European States, on the other hand, opted to couple regulation of their major airlines with outright public ownership.

The clash of interests at the conference was evident. Europe was laid in ruins, and the American aviation industry was in the lead.

An American upper hand led the other states to a strong opposition to the US premarket position, and the result was a treaty that mostly avoided unfair economic rights and privileges.

So why do I put so much emphasis on these historical eras?

Well, for one thing, the work in Chicago was a success, even though some weaknesses have appeared as time has passed. My point is that the rapid technological development - caused by the war - was tamed by the meeting in 1944. In my opinion, if these foresighted people had not taken the important initiative to form worldwide standards, international aviation could have slid into anarchy.

Secondly, some generations later, we again face major challenges. Not as a result of war this time, but as consequence of environmental demands. Increasing public demand for air transport cannot be reconciled with the supply of clean energy. In addition, the airspace and airports are moving towards a saturation point.

Another dimension is the increasing requirement for aircraft capable of performing vertical lift, and air devices capable of performing autonomous operation. Drones are an example.

I therefore like to ask if the sustainability of traditional helicopter industry is being threatened, and urged to defend itself? Are unmanned air vehicles the future, on the cost of helicopters? Eventually, how do we harmonize them?

Like in 1944, aviation is facing big game changers, due to grand evolution and development in technology. But we must remember that innovations do not always consider necessity. Remember that the automobile was invented as a toy. The necessity of the car came later. On the other hand, we can still turn it around and say that necessity is the mother of invention.

We can agree that evolution provides opportunities, but evolution, both organically and in the technological world, has no goal. Evolution lives its own life. And if the innovation can give an improved effect and can be reproduced, it has a justification.

As technological evolution takes place in several directions, differences develop. They can be exploited in a competitive market. But we should always ask ourselves whether new technological solutions are really improvements. Immature innovations can cause setbacks.

Evolution is by nature suppressed by failures. In many ways, technology will behave like an ecosystem, where gaps will be filled and taken over by other solutions.

This development cannot be stopped and does also apply in aviation. But we must ask ourselves if outcome of diversity, necessity and evolution, solely, is for the benefit of safety, economy or efficiency.

In Chicago they were ahead of their time, but the assembly came too early to think of the environment as a factor. Electric aircraft were utopian, and Unmanned Air Vehicles did not join ICAO's program until 2006.

Aviation will proceed, and, aviation shall proceed. One question is how aviation as a system should deal with drones. It is suggested that number of drones taking to the skies is predicted to grow

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exponentially as the technology improves and they become commercially viable for all manner of uses. IATA predicts 45 million drones to be flying within few years.

Airbus estimates that every hour, in 2035, the skies over Paris will consist of 150 aircrafts, but 2500 urban mobility vehicles and 16000 delivery drones. In that picture IATA states that any Unmanned Aircraft Services countermeasures which infringe on local regulations, or create higher risks, and may cause danger to other aviation stakeholders should be avoided. Understanding the potential landscape in which air operators find themselves is there for critical to ensure that aviation can grow sustainably in the future.

New opportunities will challenge aviation policymaking.

But will at the same time give new markets. Just look to wind farms. Cleaner energy is a public demand, and Airbus views the support for wind farms as a business segment that is undergoing global growth. Suggesting a thousand helicopters to be busy over the coming two decades. Helicopter may be an integral part of any logistics concept for offshore wind farms. Or could it be that drones take the job?

My personal concern is that in drone operations we easily focus on what the drone, as a tool, shall do and forget to regard the flying platform as an integrated element of a complicated air picture.

While the future is unpredictable, there are steps we can take to be prepared for what it may bring. We must identify sources of change, drivers, trends and other weak signals that could impact the future of helicopter operations.

To achieve sustainability in the helicopter industry, or in aviation in general, diversity in operation and technology must be sought. Even if sustainability may lead to disruption and suppression in certain segments. Suppression might be Ok, but disruption or compromising on safety must never be accepted.

Historically, automation has replaced labor to reduce cost and influence from unions. I am tempted to spark a debate if this argument also applies to aviation.

The Chicago Convention was held in a fear of how the aviation would react to the vast new technology in aviation in the wake of the war. That was a pro-reactive action.

Nature and technology are ongoing processes, not museums. We must understand them and welcome new species and devices. That is the course of nature. Like in 1944, let us now lead the way and let us show optimism.

Stiftelsen Solakonferansen has the main purpose of bringing together the people who can contribute to improve safety, quality and the environment in aviation. So, therefore, you are here now.

I hope the conference program can give us some ideas on how air transport with vertical lift capabilities is developing.

I would like to thank our good sponsors, advertisers and lecturers, and all of you participants for your posting, making these three conference days possible. All in the name of safety and reflection. I wish you all a good conference!

*Solakonferansen (The Sola Conference)*

*For Safety in Aviation – the most important independent arena for debate and exchange of knowledge.*

*For those having new knowledge – those who are in need of knowledge – those who want to obtain knowledge (SKB/Oct 13).*

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