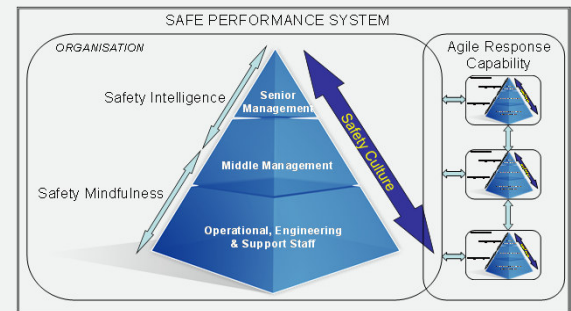




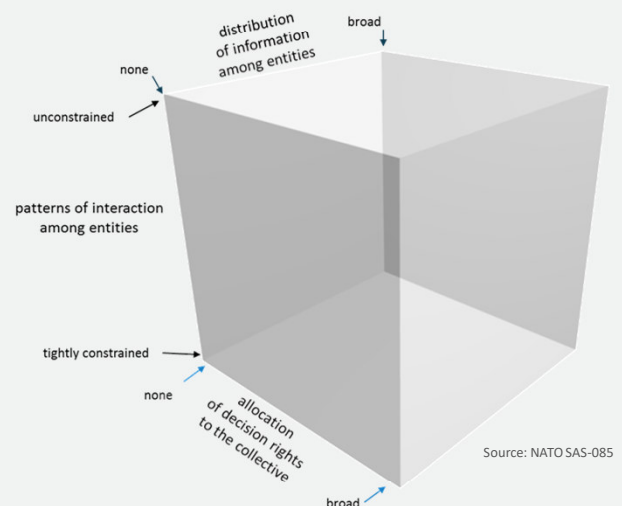
ORGANISATIONAL CAPABILITY OF AGILE RESPONSE TO CRISES

Aviation is a highly inter-connected system of systems. This means that a problem in one area may cause effects in other countries or parts of the Air Transport System (ATS). For example, a fire at a major hub can cause disruption over a large part of Europe. Additionally, there is the potential for massive system-wide events such as the volcanic ash crisis. What is needed in ATS crisis situations is not only rapid coordination, but an agile response, fast and effective. The approach of FSS WP5.4 combining Agility and Resilience Engineering perspectives is to provide aviation organisations with an Agile Response Capability (ARC) guidance material to help organizations set up and exercise more adaptive and flexible organizational structures for handling disturbances and crises.

Agility, like resilience, refers to the ability to cope with dynamics and complexity in a flexible manner by adjusting/adapting performance and the organization of work to better fit changing demands, both pro-actively as a way of preventing unwanted outcomes and re-actively as a way of coping with unwanted events. Two important aspects to be explored are here called the Problem space, or the changing characteristics of the situation that play an important role in developing and applying an appropriate response, and the Agile Response space, or the parameters that can be varied in the organization of the response in terms of allocation of decision rights, information flow, and interactions.

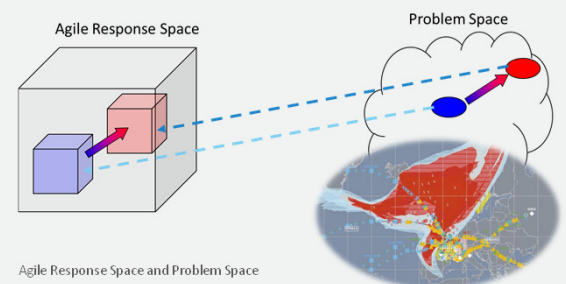


Project #5 Work Packages



Source: NATO SAS-085

When circumstances change, a different approach might be more appropriate



Agile Response Space and Problem Space

Volcanic ash as an example ATS-wide crisis
Source: EVITA, EUROCONTROL

Rogier Woltjer (rogier.woltjer@foi.se)
Björn J.E. Johansson, Per-Anders Oskarsson, Peter Svenmarck, FOI