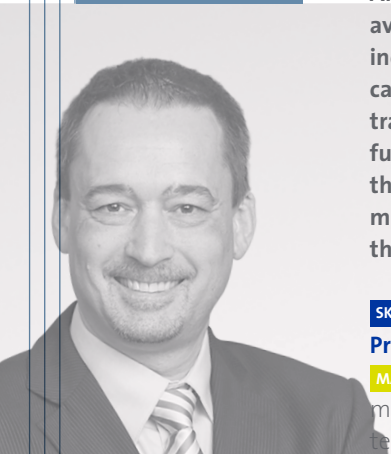


CHANGE AND ITS RISKS

TECHNICAL AND ORGANIZATIONAL TRANSITION IN A SAFETY-CRITICAL ENVIRONMENT

MARCO SIEBER
Head of
Data Services



Marco Sieber leads a team of 120 people in Data Services and is responsible for implementing and operating the software components of the skyguide Virtual Centre Programme (VCP). His challenge is to gradually transform the existing Air Traffic Control (ATC) systems into a new Service-Oriented Architecture (SOA) while assuring the permanent availability of the systems without significantly increasing skyguide's IT workforce. This technical transition necessitates also an organizational transformation as roles, processes and technologies fundamentally change. Marco Sieber believes that the challenges of the organizational transformation are much higher than the challenges of the technical transition.

SKYGUIDE What impact does the Virtual Centre Programme have on your organization?

MARCO SIEBER The VCP is affecting my division in two major aspects: technology and methods. On the technology side, we are changing from a vertically integrated architecture into a horizontal integration pattern using a central integration platform hosted on an on-premise private cloud that is provided and monitored by our external partner DXC in Sofia (Bulgaria). On the side of methods, we are implementing Agile software engineering practices and emphasizing collaboration and communication between development and technical operations while automating the process of software delivery and infrastructure changes (DevOps). Because we concentrate our IT infrastructure in Dübendorf and due to the cooperation with DXC, the way we will operate our platforms will be subjected to significant changes.

During this long transitional period, all these additional tasks are increasing the workload of your staff tremendously, are they not?

MS During this transition period, the legacy systems still have to be maintained and adapted to changing needs, which indeed keeps my organization busy, not allowing it to contribute to the transition and to prepare for the “new world”. This problem of “hybrid architecture” could be solved by building a new Virtual Centre Programme organization, but this entity would not benefit from internal know-how and experiences. We decided on a different approach: to hire additional staff temporarily to support the legacy systems, which allows us to delegate some of our staff to the Virtual Centre Programme. Onboarding new resources created a certain drop of performance. We have involved the line management as work stream leaders of a dedicated transformation project to ensure the best-possible transition to the line organization.

What are the challenges in the organizational transformation?

MS While the technical transition managed by the VCP is very demanding, the organizational transformation is the real challenge. Both will take years for implementation, but we are more used to conducting technical than organizational change projects. In a safety-critical business like ours, a certain risk-averseness and change resistance is linked to the resilience we have to demonstrate as a HRO (High Reliability Organization): we are relying on a stable and professional organization both on the business and the technical side. This does not positively support change. We need to *unfreeze* the current stable state, go through the *change* in a controlled way and *freeze* a new stable state again after the transformation. The biggest challenge in an organizational transformation is not the learning – it is the unlearning.

“ The biggest challenge in an organizational transformation is not the learning – it is the unlearning ”

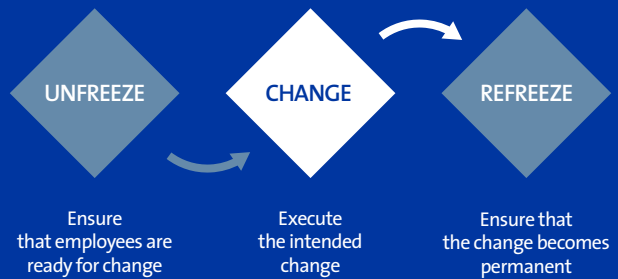
Change is inevitably coupled with risks, as you say. How do you explain to your people that we still need to make some changes?

MS Our people are very responsible, and we need to explain to them that the company is willing to accept an increased level of technical risks, which of course needs to be controlled and must not impact safety. We have to tell them, too, that the management assumes these risks and that the staff will not be blamed for mistakes or problems in the transition phase. The aim is to take away this pressure from our staff and thus increase the openness for change. Skyguide’s Just Culture is very supportive in this regard.

Where do you actually stand in the organizational transformation?

MS We are at the beginning of the transformation. The transformation project is currently focusing on topics relevant for the organization to operate and maintain the new technical platform and the first services running on it. This step has to be achieved in the 1st quarter of 2018. In the next phase, the focus will then be on designing the target organization in terms of people, processes and technology and to define the transition roadmap. Our people are spread in different rooms of the “Change House”, depending on the involvement in the change so far and on the willingness to change. I see more and more commitment for change and a growing momentum that we have to feed with creating success stories, involving more and more people in the change and increasing communication. ■

KURT LEWIN’S MODEL OF CHANGE



THE CHANGE HOUSE

