

Risk and Vulnerability Analysis

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LUCRAM

- **Lund University Centre for Risk Analysis and Management**
- **Network at Lunds University**
- **Coordination of research on risk management**
- **Contact point for external activities**



FRIVA – a research programme

- Risk and Vulnerability Analysis
 - March 2004 until March 2007 (2010)
 - Financed by the Swedish
Emergency Management Agency
 - Research Capacity Establishment
 - 8 doctoral projects
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FRIVA Subprojects

- DP2: Risk and vulnerability assessment
methods for analyses of critical
interdependent infrastructures
 - DP3: Crisis management: preparedness,
response and recovery
 - DP4: Crisis management and social
vulnerability
 - DP5: Proactive crisis management and
safety culture
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FRIVA Delprojekt

- DP6: Regional vulnerability analysis
- DP7: Risk and vulnerability analysis of large scale infrastructures – electric power and drinking water supply
- DP8: Risk and vulnerability analysis of large scale infrastructures – tele and IT systems
- DP9: Statistical analysis and simulation of extreme events



COST project

- 3S, A safe and secure society
- Scientific element on relationship between safety and security
- Application element on how various actions can contribute to improving safety and security
- Integration of the two aspects



Future

- Interdependence and complex systems
- Adaptive systems
- System capabilities
- Robustness



Conclusions

- Multiscientific competence is necessary in risk and vulnerability analysis
- User requirements are important
- Integrated approach is required
- Interplay between network
- Interdependence and dependence

