Everything said and done? The role of the humanities and social sciences in nuclear waste governance

Karena Kalmbach, PhD Assistant Professor, History of Technology

	•		•	•	•		•
•	•	•	•	•		•	•
•	•	•	٠	•	•	•	•
•	•	•	•	•	•	•	
•	•	•	•	٠	•	•	•
•	•	•	•	•	•	•	
•	•	•	٠	•	•	•	•
•	•	•	•	•	•	•	•
•	•	•	•	•	•	•	•
•	•	•	•	•	•	•	•
•	•	•	•	•	•	•	•
•	•	•	•	•	•	•	•
•	•	•	•	• 0	•	•	•
•	•	•	•	•	•	•	•
•	•	•	•	•	•	•	•
•	••	•	•	•	•	•	•
•	•	•	•	•	•	•	
•	•	•	•.	•	•	•	•
•	•	•	•	•	•	•	•
•	•	•	•	•	•	•	
•	•	•	•	•	•	•	•
•	•	•	•	٠	•	•	
•	•	•	٠	•	•	•	•
•	•	•	•	•	•	•	
•	•	•	٠	•	•	•	
•	•	•	۲	•	•	•	
•	•	•	٠	•	•	•	•
•			•	•	•	•	
	•	•	٠	•	•	•	
•	•	•	•	٠	•	•	•
•	٠		•	•	•	•	•
•	•	•	٠	•	•	•	•
•	•	•	•	•	•	•	
•	•	•	٠	•	•		•
•	•	•	•	•	•	•	•
•	•	•	•	•	•	•	•
	•	•	٠	•	•	•	•
				•	•	•	
•			٠	•	1		-
		÷	٠	•	•		
•		•	٠	•	•		
•		•	•	٠			
•	•	•	•		•		R 1
•				•			•
•	•		•	•	•		•
•	•	•	•	•	•	•	•
. (• 4		• 1	• •	6 (- 2	•
•	• **	•	•	• •	• 1	•	•
• •		•	•	•	•		
	13				e i e	1.5	
	-			1 . (5.6		2
						c •	
			•		•		
•		•	٠				- 9
			é		à		

TU

Technische Universiteit **Eindhoven** University of Technology

Where innovation starts

Outline

I. Introduction

- II. Nuclear Waste Research in the Social Sciences and Humanities: Where do we stand?
- III. Anything left to do? Some Outlines of Research Desiderata
- IV. Too High Expectations? The Future Role of Social Sciences and Humanities in Nuclear Waste Governance
- V. Conclusions



Introduction

- I. Research Background :
 - I. Chernobyl
 - **II.** Nuclear History
- II. ENTRIA / Environmental Policy Research Centre (FU Berlin)
 - I. German Nuclear Waste Commission
 - **II.** Public Debates on Dose Limits
- III. TU Eindhoven: Technology, Innovation & Society
 - I. NIRG, Nuclear History and Ethics



Nuclear Waste Research in the Social Sciences and Humanities: Where do we stand?

- I. Nuclear Risk and Modernity
 - I. Beck's Risk Society (1986)
 - II. Charles Perrow's Normal Accidents (1984)
- II. Public Perception of Risk / Participation / Acceptance-Acceptability
 - I. Salomon et al (2010)
- **III.** Ethics: Future Generations / Justice
- **IV.** History / Anthropology: Site Marking, Individual Case Studies



Anything left to do? Some Outlines of Research Desiderata

- I. Historization of the Field of Public Perception of Risk
 - I. Institutions, Persons, Networks, Funding
 - II. Uptake of Research Results through Stakeholders
 - III. Scientists as Stakeholders, their Shaping of the Discourse
- II. Historization of Nuclear Waste
 - I. Nuclearity (Hecht) → (Geographical) Power Scales
 - II. (Changing) Social Definitions of Waste
 - **III.** Nuclear Singularity



Too High Expectations? The Future Role of Social Sciences and Humanities in Nuclear Waste Governance

- I. The German Nuclear Waste Debate: Calls for a Stronger Role of the Humanities and Social Sciences
 - I. "We need historians to be able to move forward!"
 - II. "We need social scientists to bridge the front lines!"
- II. How do these expectations align with the reality and internal logics of the academic system?
- III. What if the research does not deliver what the stakeholders wish for?
- IV. Who should pay for it? Where are the limits of academic independence?



Conclusions

- I. A huge amount of research results is already available.
- II. There could be still a lot done, in particular in terms of the historization and contextualization of this very research.
- III. New academic research will not automatically result in new and promising strategies for nuclear waste governance.
- IV. Very likely, it will rather raise new questions and increase the complexity instead of providing clarity and simplification.
- V. Thus, the stakeholders of the nuclear waste debate should be more considerate of the role they attribute to academic research in the social sciences and humanities.



Thank you !

