

# Regulator Safety Culture

## AN INITIAL CONCEPTUAL FRAMEWORK

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# Outline

- **Background**
- **Method:**
  - Literature review
  - Interviews with safety culture experts
- **Conceptual framework**
- **Next steps**

# Background

➤ **A number of disaster inquiries have identified regulatory failures:**

- **Piper Alpha**
- **Fukushima Daiichi**

**“in order to ensure effective regulatory oversight of the safety of nuclear installations, it is essential that the regulatory body is independent and possesses legal authority, technical competence and a strong safety culture” (p. 7)**

# Literature

- Very little empirical research
- Reiman and Norros (2002) investigated the culture of the Finnish nuclear regulator.
- NEA published a 'green booklet' guide on regulator safety culture in 2016

# Expert interviews

- **Interviewed 13 safety culture experts:**
  - **Academics**
  - **Regulators with responsibility for safety culture**
  - **Consultants**
- **Interview focused on:**
  - **Utility, name and definition**
  - **Main dimensions**
  - **Assessment**

# Utility, Name and Definition

- All interviewees agreed that the construct was important
- Less agreement about the name for the term with many preferring “regulatory culture”
- Wide range of definitions which mirrored the range of definitions of safety culture

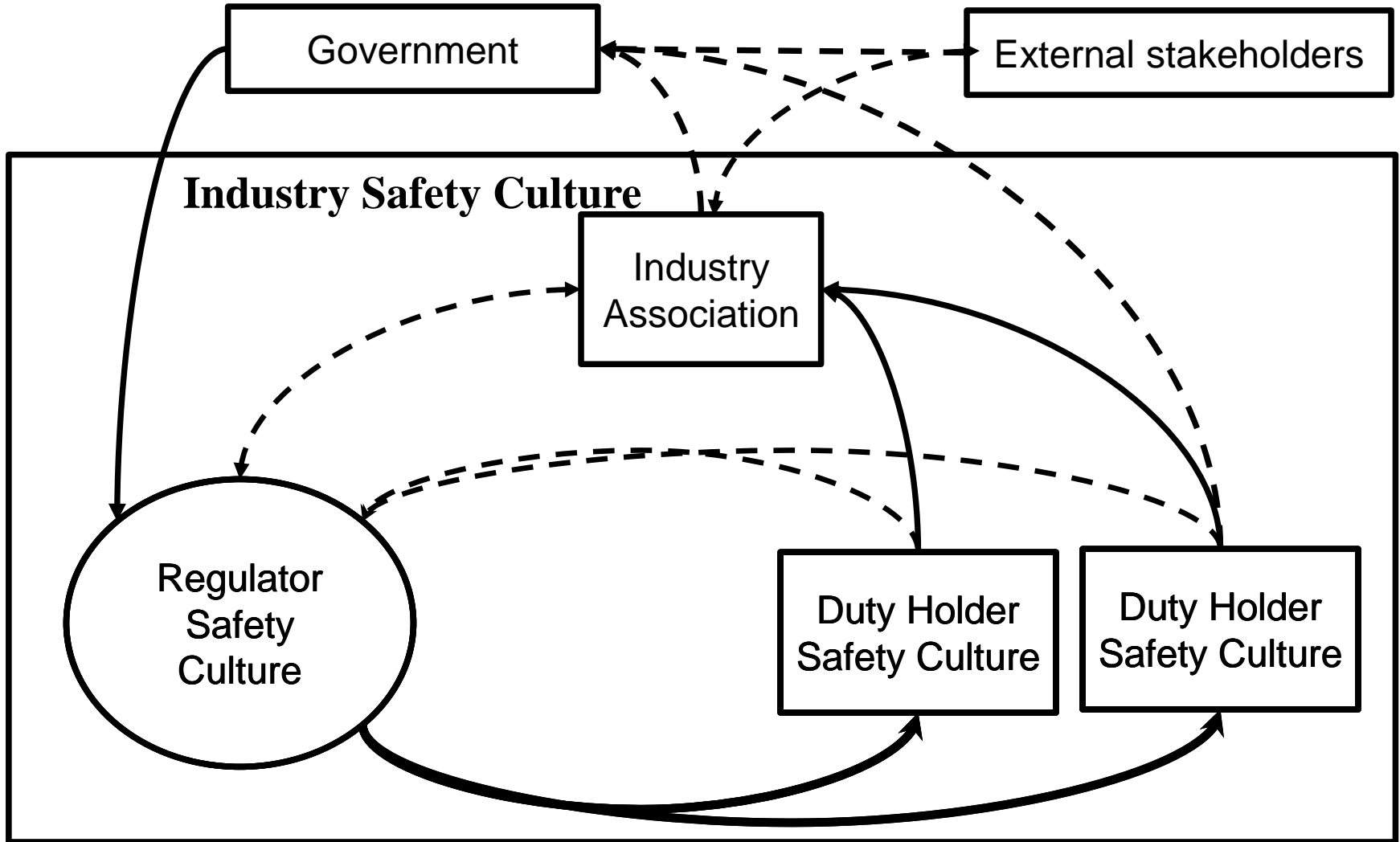


# Comparison with models

IAEA Framework	NEA framework	Proposed model
Leadership for safety is clear	Leadership for safety	Leadership commitment to creating a positive safety culture
Accountability for safety is clear	Individual responsibility and accountability	Commitment to high ethical standards
	Cooperation and open communication	Commitment to transparency and open communication
Safety is learning driven	Learning and continuous improvement	Desire for continuous learning and self-improvement
Safety is a clearly recognized value	Systematic approach	Proactive, risk informed and flexible approach to enhancing safety
Safety is integrated into all activities		



# National Culture



# Assessment

- **General agreement that a multi method approach was required**
- **Need for the development of assessment tools**
- **Some experts noted the importance of including duty holders in the assessment process**

# Next steps

- **Go back to expert group with proposed framework**
- **Develop a pilot questionnaire**
- **Conduct a number of regulator safety culture assessment to develop and test assessment process**