



**ALEXANDRE  
PAPADOPOULOS**

**MAKING INTELLIGENT SYSTEMS  
EXPLAIN THEMSELVES**

# AI AND EXPLANATIONS

“No computer has ever been designed that is ever aware of what it’s doing; but most of the time, we aren’t either.”

Marvin Minsky, Cognitive Scientist (Co-founder of AI)

“The ability to explain observed behaviour is a hallmark of human rationality.”

Gilbert Harman, American Philosopher

“Explaining one’s reasoning is a hallmark of intelligence.”

# GIVE EXPLANATIONS TO USERS



## WHICH?

- Best explanation
- Many explanations
- Deeper explanations



## HOW WE COMPUTE THEM?

- It's very hard
- Compute lot of stuff,
- And store it

# WHY ARE THEY IMPORTANT?

- Help user's understanding and acceptance
- Knowledge-based Configuration
  - Telecommunications
  - Product configuration

# IN THESIS

## THESIS IN 3: THE ELEVATOR PITCH FOR A PHD

