

## What is a *fair* insurance premium?

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## Assessment criteria

This student assessment tool is only a suggestion. If the teacher finds it appropriate, some criteria can be excluded and even others may be included. We suggest that the assessment of the individual student as he/she is working in the group is derived from the assessment of the student working in the following dimensions

1. **Knowledge dimension** (refining his/her usage of the relevant concepts, refining his/her understanding of relations between mathematics, technology, science and society)

2. **Reasoning dimension** (gathering information, identifying patterns, critical reasoning skills, drawing valid conclusions, using mathematics in argumentation)

3. Communicational dimension (presentation and discussion, listening to others).

	Group:	Student name
Crite	eria for assessment	
Usage of the relevant concepts	Uses all relevant concepts incorrectly	
	Uses many relevant concepts incorrectly	
	Uses some relevant concepts correctly	
	Uses many/all relevant concepts correctly	
Understanding of relations between mathematics, technology, science and society	Does not understand the complex net of relations between mathematics, technology, science and society	
	Understands that mathematics influents society, but does not understand that aspects of society influences the way we do mathematics.	
	Understands some of the interactions between mathematics and society.	
	Understands the complex net of relations between mathematics, technology, science and society	
Gathering information	Unable to find relevant information in the task description as well as handling information from own experiences in an appropriate (reflective) manner.	
	Finds relevant information in the task description, but does not draw on own experience.	
	Finds relevant information both in task description and from own experience, only reflects on own experiences to a minimal extent.	





	Finds relevant information in the task description and handles information from	
	own experiences in an appropriate (reflective manner)	
Identifying patterns	Does not analyze information so as to identify a pattern.	
	Analyzes information by means of typical modeling tools, but does not identify a pattern.	
	Analyzes information by means of typical	
Critical reasoning skills	modeling tools, and identifies a pattern Does not take a critical attitude towards conclusions.	
	Attempts to takes a critical attitude towards conclusions but does not manage to fully reflect on the conclusions	
	Takes a critical attitude towards conclusions and manages, to some extent, to reflect on the conclusions	
	Takes a critical attitude towards conclusions and manages in an elaborate way to reflect on	
	the conclusions Does not present his/her thoughts in an	
	argumentative fashion. Attempts to present his/her thoughts in an	
Argumentative skills	argumentative fashion, but conducts many argumentative errors.	
	Present his/her thoughts in a clear and	
	argumentative fashion, but conducts some	
	argumentative errors. Present his/her thoughts in a clear and	
	argumentative fashion.	
	Does not attempt to mobilize mathematical	
	aspects of discussion into elements of an argument.	
	Attempts to mobilize mathematical aspects of discussion into elements of an argument, but	
Using methometics in	does not argue persuasively.	
Using mathematics in argumentation	Attempts to mobilize mathematical aspects of	
U U	discussion into elements of an argument, and manages to some extent to argue	
	persuasively. Mobilizes mathematical aspects of discussion	
	into elements of a clearly presented sound argument.	
Presentation and discussion	Participates in neither group discussion, presentation, nor final discussion	
	Participates only in group discussion.	
	Participates both in group discussion and presentation.	
	Participates in all three aspects.	
	Does not listen to others.	
Listening to others	Listens to others, but does not attempt to react to or operationalize received ideas or thoughts.	
	Listens to others and reacts to received ideas or thoughts, but does not attempt to operationalize these ideas and thoughts.	
	Listens to, reacts to and attempts to	
	operationalize the ideas and thoughts of others.	

