



# Students Teams Awards

- ✓ 1st prize: 500 Euros
- ✓ 2nd prize: 300 Euros
- ✓ 3rd prize: 200 Euros


# Estimation Challenge Inputs

1. A set of detailed functional requirements.
2. A set of functional requirements at unspecified levels of completeness.
3. Some non-functional requirements (NFR).
4. Description of a development environment.
5. A data set with historical data on development productivity.

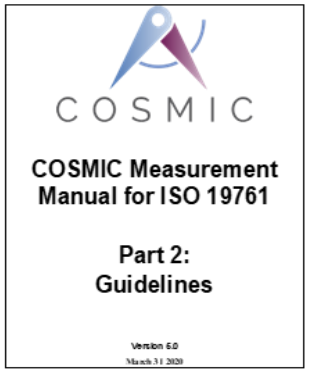

# Estimation Challenge Tasks

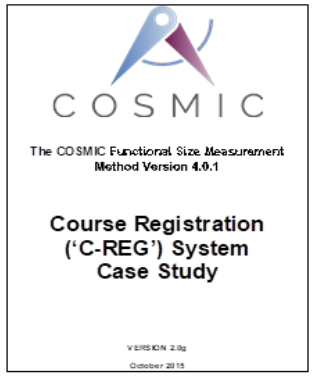
Using the Challenge ‘case study’:

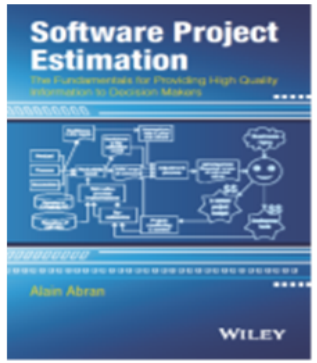
1. Size with COSMIC the detailed functional requirements.
2. Approximate the size of other functional requirements.
3. Size the non-functional requirements allocated to software functions.
4. Develop an estimation model from historical data provided.
5. Estimate the effort to develop both functional & non-functional requirements.

# Useful Documents for the Challenge

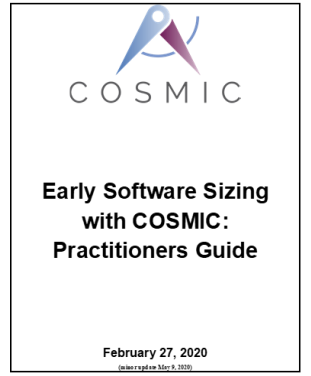


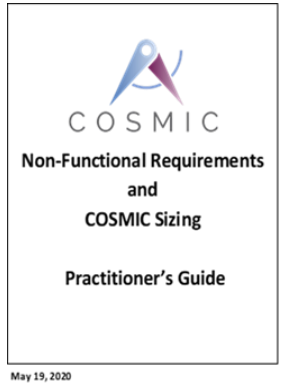


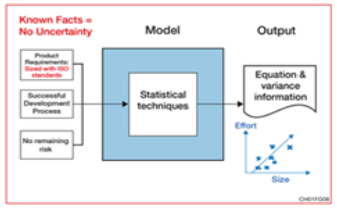




Chapters 5, 6 & 9



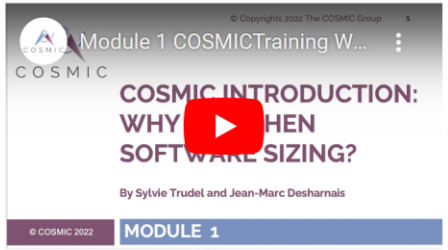

# Free access to COSMIC documents

- COSMIC Measurement Manual (cosmic-sizing.org)
- Case Studies Archives - Cosmic Sizing (cosmic-sizing.org)
- Early Software Sizing, Practitioners - Cosmic Sizing (cosmic-sizing.org)
- Non-Functional Requirements and COSMIC Sizing Practitioner's Guide - Cosmic Sizing (cosmic-sizing.org)

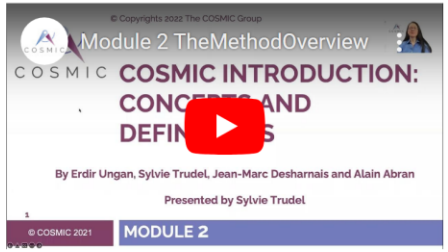

# YouTube Training Material

## Learn COSMIC Sizing from these Videos (cosmic-sizing.org)

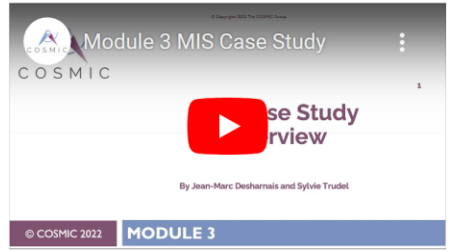
Learn the essentials of the COSMIC software sizing methodology from these videos produced in English and French.




Training Module 1 – Why Measure Software Size

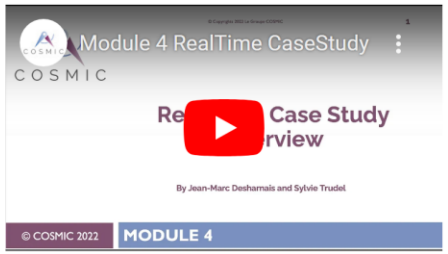



Training Module 2 – The Method Overview

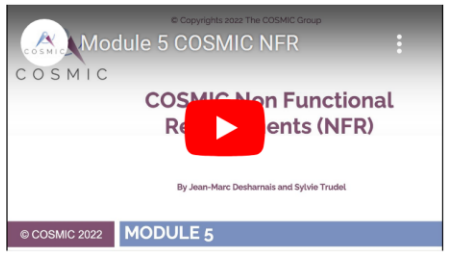



Training Module 3 – MIS Case Study

Module 1 Slides




Training Module 4 – Realtime Software Case Study




Training Module 5 – Non-Functional Requirements


Training Module 6 – Early COSMIC Sizing


# More Training Material

- Module 7: Estimation process in software engineering (slides) - Cosmic Sizing (cosmic-sizing.org)

- Tutorial - Early Sizing - Module 1 - Description of techniques - Cosmic Sizing (cosmic-sizing.org)


# Teams registration

- Team size: from a mininum of 2 students to a maximum of 5 students.
- The team leader must register his team by April 25, 2024. Contact: alain.abran@etsmtl.ca
- There is no registration fee.


# Students feedback (2022 Challenge)

- *".. an extraordinary experience for me. It was an instructive and entertaining activity and reinforcing work; thank you very much."*
- *"… fun working together with friends."*
- *".. a different and unique experience."*
- *"Thanks to our professors, we became aware of this COSMIC challenge and participated in the challenge. It was beneficial for us. I think we will use these things we learned in our future business life, and I would like to thank our professors."*
- *".. both a fun and instructive challenge. I am happy to participate and experience."*
- *"..beneficial to understand estimating project size."*

Source: Hacaloglu *et al*., 'A Survey on COSMIC Students Estimation Challenge', IWSM-MENSURA – Izmir (Turkey) 2022.


# More information

[Software Estimation Challenge - Cosmic Sizing (cosmic-sizing.org)]

**Contact: alain.abran@etsmtl.ca**