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2023-1-RO01-KA121-SCH-000113618

LICEUL TEHNOLOGIC "DIMITRIE LEONIDA" IAȘI

FROM STEM TO STEAM EDUCATION: A NEW LEARNING APPROACH

11 – 16 MARTIE 2024, AMSTERDAM, OLANDA

ORGANISATION: EUROPASS TEACHER ACADEMY, MOLINOS DE VIENETO

PARTICIPANȚI:

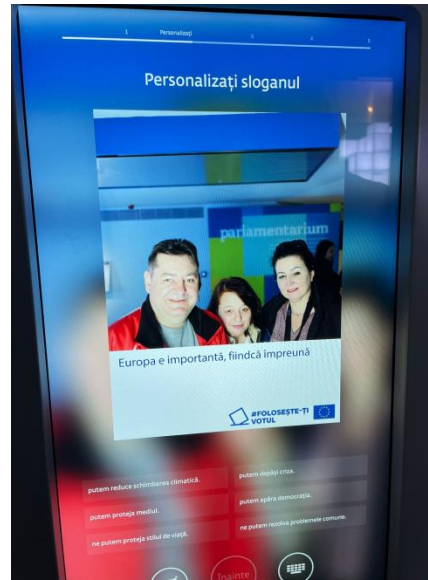PROF. DR. ING. CARMEN CEZARINA BURLIBAȘA

PROF. ING. CRISTINA DANIELA DĂNILĂ

PROF. ING. CĂTĂLIN MIHAI COSTAȘ
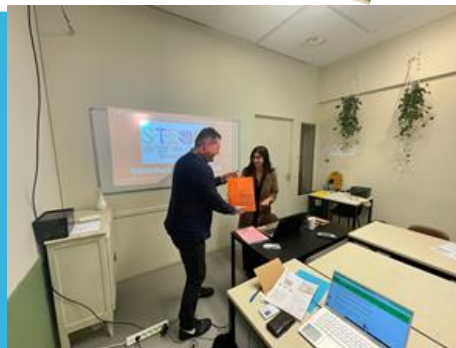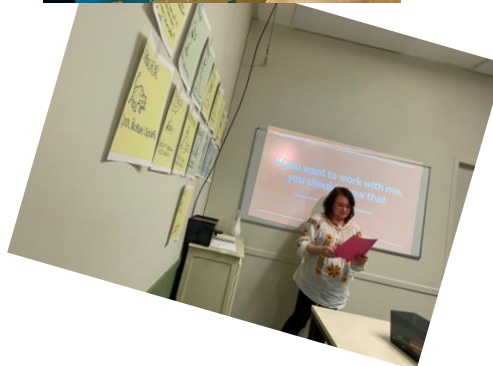
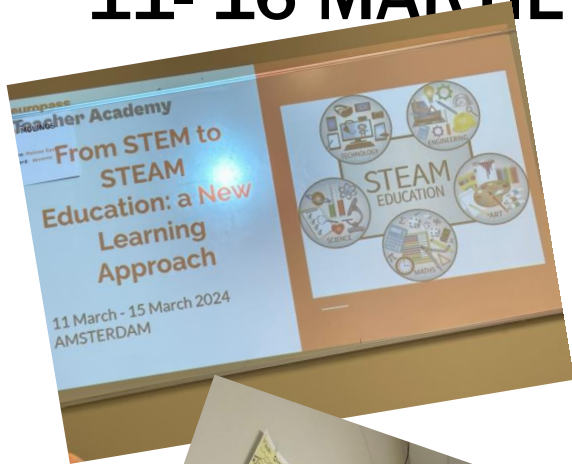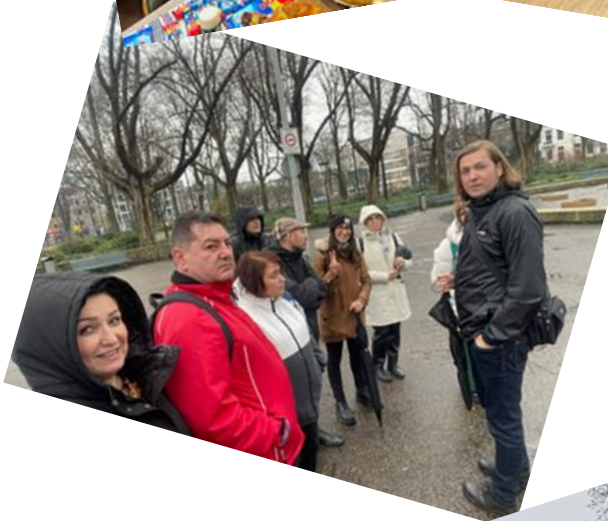PROF. ING. GEORGIAN COSMIN PINTILIE

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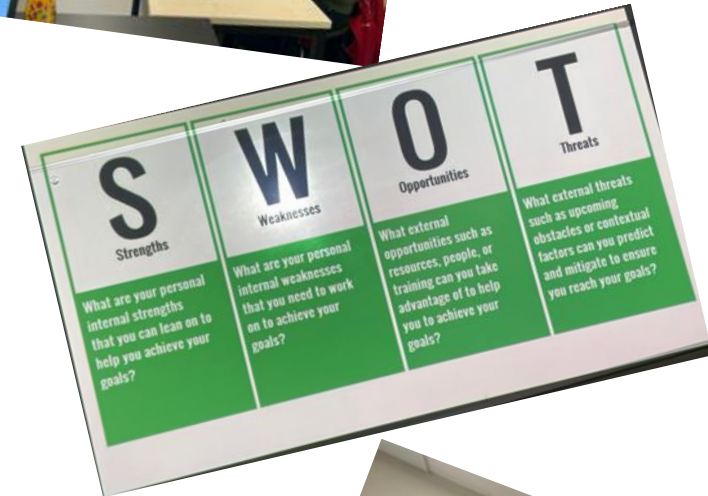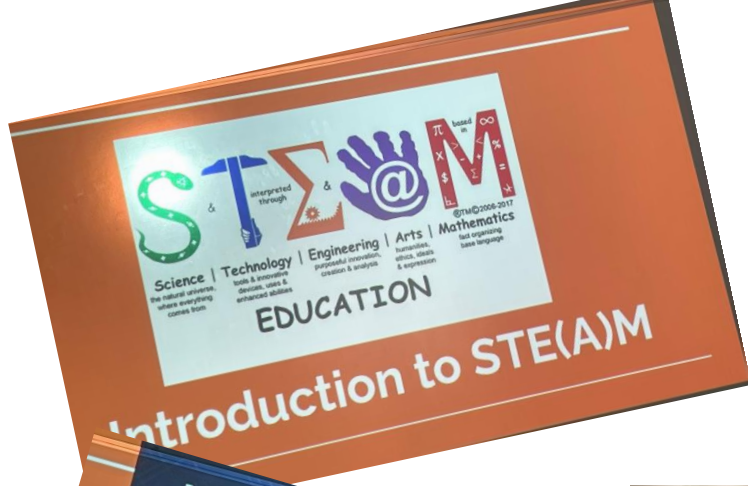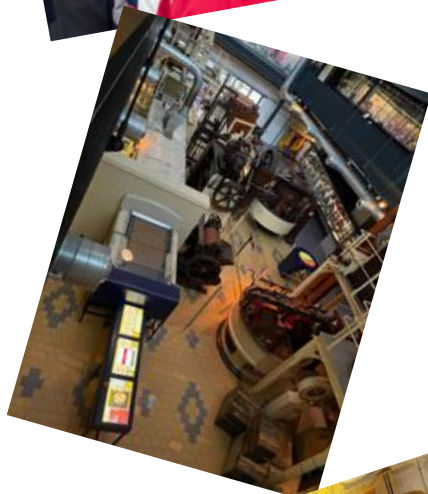
Why is it STEM vs STEAM and not STEM & STEAM

- STEAM Is Just a Trend from the United States
- STEAM Is Only for Artistic Students
- STEAM Dilutes STEM Knowledge
- STEAM Is Only for Primary Education
- STEAM Is a Standalone Curriculum
- STEAM Is Only About Creativity
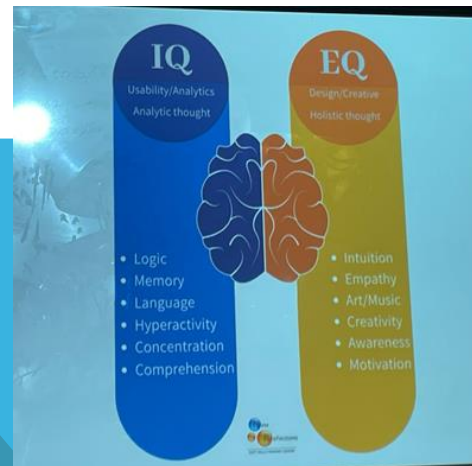- STEAM Is Exclusively for "Gifted" Students

STEM vs STEAM
DOES THE 'A' MATTER?

USING TECHNOLOGY BETTER

5 Myths about STEAM Learning

STEAM READY

- ✖ "We don't really have any budget for all those flashy robots!"
- ✖ "You need a dedicated room, don't you?"
- ✖ "The E isn't something we need to focus on at our level."
- ✖ "The A just confuses things and dilutes the science focus."
- ✖ "Just give it to the students and let them 'go for it!'"

- ✔ STEAM is about integrated problem solving and can be completely 'unplugged!'
- ✔ STEAM reaches its potential for impact when embedded in all classrooms.
- ✔ Engineering is the intersection between 'Science' and 'Technology.' ie. 'making'.
- ✔ The 'A' involves all the humanities, including ethics and societal impact.
- ✔ The teacher's role is to guide, scaffold, instruct and encourage - critical to success.

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Create — create invent plan compose construct design imagine

Remember — name describe relate find list write tell

Understand — explain compare discuss restate predict translate outline

Apply — show complete use classify examine illustrate solve

Analyze — explain compare contrast examine identify investigate categorize

Evaluate — decide rate choose recommend justify assess prioritize

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Storyboarding

- The first step in creating a digital story is to make a storyboard.

- A storyboard requires you to think about your project scene by scene and all the details, like text overlays, narration, transitions between scenes, music, and titles and credits.

- Storyboard Example:
http://medt7490-visualandmedialiteracy-project3.wikispaces.com/

- Don't forget . . . The elements and principles of visual design and good layouts apply to all visual messages, so they apply to our digital story, too.

SUSTAINABLE DEVELOPMENT GOALS

SUSTAINABLE DEVELOPMENT GOALS

1 NO POVERTY
2 ZERO HUNGER
3 GOOD HEALTH AND WELL-BEING
4 QUALITY EDUCATION
5 GENDER EQUALITY
6 CLEAN WATER AND SANITATION
7 AFFORDABLE AND CLEAN ENERGY
8 DECENT WORK AND ECONOMIC GROWTH
9 INDUSTRY, INNOVATION AND INFRASTRUCTURE
10 REDUCED INEQUALITIES
11 SUSTAINABLE CITIES AND COMMUNITIES
12 RESPONSIBLE CONSUMPTION AND PRODUCTION
13 CLIMATE ACTION
14 LIFE BELOW WATER
15 LIFE ON LAND
16 PEACE, JUSTICE AND STRONG INSTITUTIONS
17 PARTNERSHIPS FOR THE GOALS

IQ
Usability/Analytics
Analytic thought

- Logic
- Memory
- Language
- Hyperactivity
- Concentration
- Comprehension

EQ
Design/Creative
Holistic thought

- Intuition
- Empathy
- Art/Music
- Creativity
- Awareness
- Motivation

Digital Storytelling Process

Step One: Come up with an idea. Write a Proposal
Step Two: Research/Explore/Learn
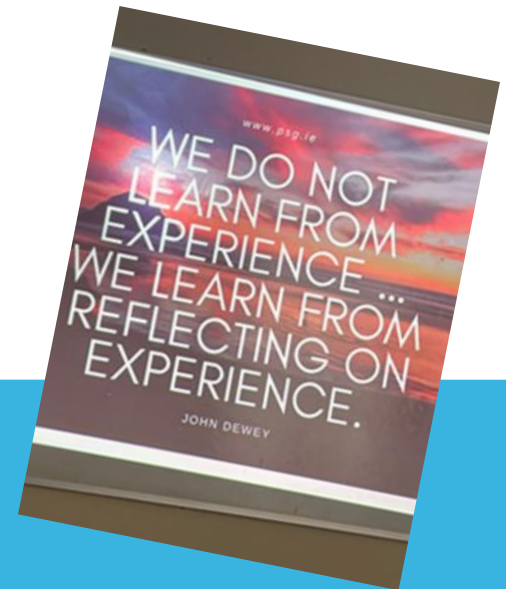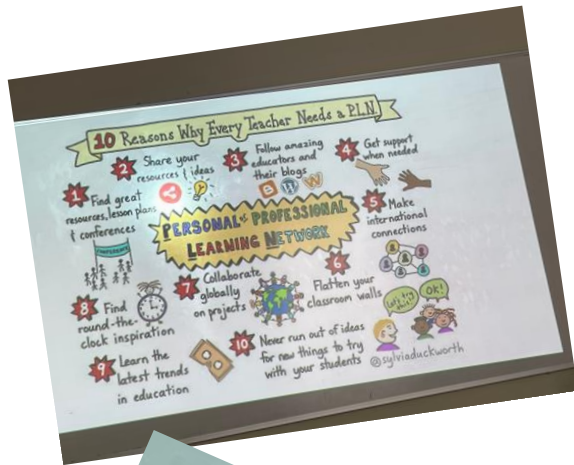Step Three: Write/Script
Step Four: Storyboard/Plan
Step Five: Gather/Create Images, Gather/Create Audio, Gather/Create Video
Step Six: Put It All Together
Step Seven: Share
Step Eight: Feedback and Reflect

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VĂ MULȚUMIM PENTRU ATENȚIE!

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