



How games can design our capacity to be active citizens: the (almost) hidden role of Information Literacy

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Games based learning for Information literacy



Aims and objectives

NAVIGATE aims at enhancing students' competencies in recognising fake content. The definition adopted by the team is as follows: Fake content (print, digital, oral) is considered disinformation, inaccurate and uncertified information. To filter fake content, the measurable characteristics of quality information include: authority, purpose, format (accuracy), relevance, documentation and timeliness.

The project objectives are:

- To develop a game-based model for information literacy training consisting of a syllabus based on the competency tree;
- To elaborate learning material such as games included in the syllabus, working modules with specific game tasks, game-based learning activities.

Fake content, some times it is evident...

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Psychology

Study delivers bleak verdict on validity of psychology experiment results

Of 100 studies published in top-ranking journals in 2008, 75% of social psychology experiments and half of cognitive studies failed the replication test

Psychology experiments are failing the replication test - for good reason

Ian Sample *Science editor*

@iansample

Thu 27 Aug 2015 19.00 BST

f t e 17,607 476

This article is over 2 years old



It depends also on our ability to focus on the problem





Navigate's aim

is to support the acquisition of

the competences enhancing

critical thinking and awareness

about the importance of Information Literacy

in today society.

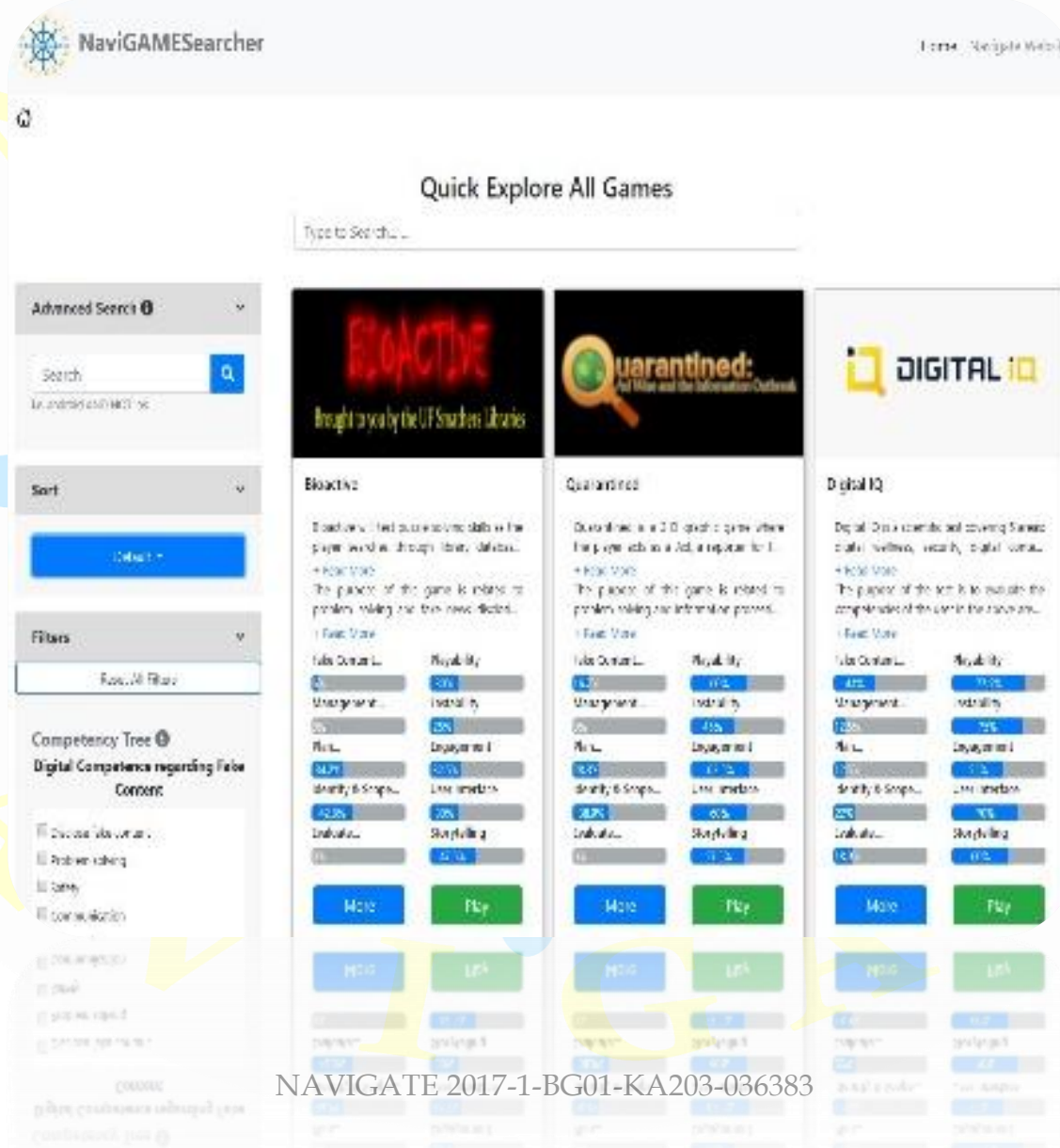
Methodology, First findings and Results



STEP 1 >



STEP 2 >



NAVIGATE 2017-1-BG01-KA203-036383

Games based model Strategy

The important learning outcomes for NAVIGATE project are the students to:

- Have a set of skills to identify different types of information sources, identify them and work with different text formats;
- Apply a set of criteria for analyzing and evaluating information from different sources (e.g. social networks), including critical analysis to avoid fake content;
- Have and apply critical thinking in the educational process;
- Be able to build effective information search strategies, using different approaches and techniques;
- Know the term “plagiarism” and techniques for its prevention;
- Be able to create own content and present it;
- Integrate new knowledge into the scope of already accumulated knowledge.

STEP 3 >

Competences - Matrix (regarding the content, activities and assessment areas)	Learner needs and priorities for the NAVIGAME game/s to develop – to give high priority to
Digital competence - regarding fake content	<ul style="list-style-type: none"> • “Disclose fake content - my safety rules of surfing?”, • “Problem solving - my awareness?”, • “Safety - my competences?” and • “Communication - my competences?”
Manage and communicate information	<ul style="list-style-type: none"> • “Reference management software - you use it?”, • “Cite and refer sources - a must!” and • “Copyright and Creative Commons - aware?”
Plan - find relevant information	<ul style="list-style-type: none"> • “Search techniques and specialist search tools - do you have a clue?”, • “Vocabularies and taxonomies - your knowledge?” and • “Define a search strategy and search tool”
Identify and scope - search/find information	<ul style="list-style-type: none"> • “Do you know the scientific sources?”, • Use Library guides - research and topic guides, • Apply the principles of effective searching?” and • “Identify a search topic - using keywords and search words?”
Identify, evaluate and avoid fake information	<ul style="list-style-type: none"> • Almost no (Note: Newer custom games are available on the market)

Models of use of the NAVIGATE Framework (Teacher Embedded Games)

- The teacher uses the games based on the NAVIGATE Competency Framework for a hierarchy of the sources of the course (subject, discipline)
- Recommended (guided, directed) use of the games for avoiding Plagiarism and understanding IPR and Creative Commons in the NAVIGATE Framework
- Instruction by teacher and librarian to use dictionaries based on quality criteria and avoiding fake content
- Instruction via teacher in workshop as practice exercise - for practice game and informing students of avoiding creating fake info
- Integrated learning modules for written or group assignment regarding avoiding creating fake information - complementary and additional course material
- Teacher brings the value of the context with games on the line time to the subject information
- Integrated learning modules for specific designed assignment regarding avoiding fake information - as instructed and additional course material
- Assessments with integrated learning modules for specific designed assignment regarding information literacy of avoiding fake information - as instructed course material - using specific Rubric (assessment criteria)

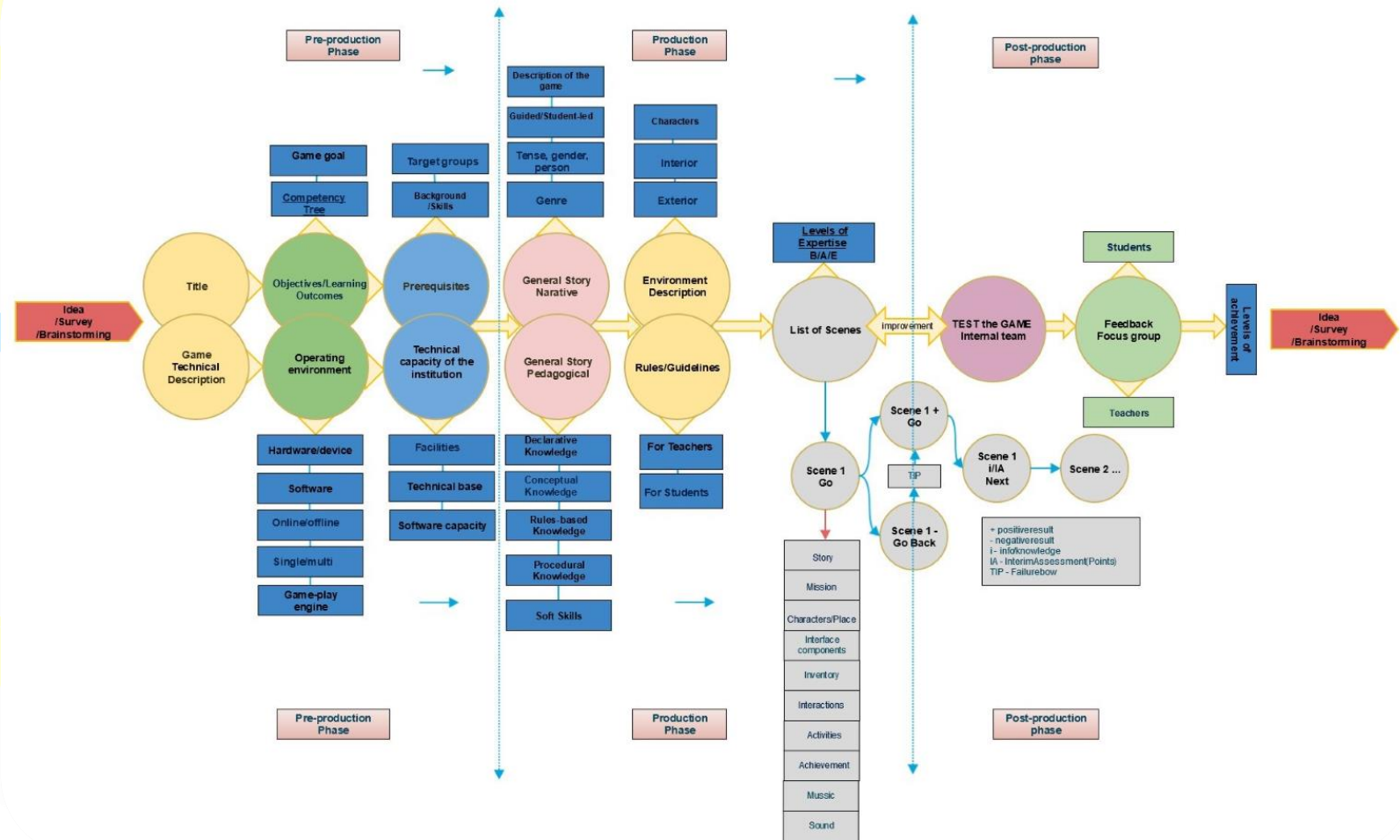
Types of use of the game, regarding the specific skills (student)

- Free game use via university e-learning system and library web sites
- Recommended use of the games on Plagiarism via open educational resources as course content in the learning management system (in LMS as a OER-module)
- Recommended use of the Dictionary games in formal or informal settings
- Instructed use of games as training and adapted learning to create academic (not fake) content
- Motivated use of the games for course assignment, embedding game-based learning for avoiding fake content in creating documents
- Recommended specific game modules on the line time for training the use or making conscious decisions regarding critical and crucial skills in the context
- Complementary and recommended use of the specific games relevant and connected to the specific area of skills for avoiding fake content regarding the assignment/task
- Complementary and recommended use of the specific games for avoiding fake content relevant and connected to the specific area of skills in the rubric - calculated as additional ECTS in the study guide or assignment as assessment

LEARNING OUTCOMES, IL DOMAINS (SKILLS FROM THE COMPETENCY TREE) & TYPES OF KNOWLEDGE MATRIX					
IL Topics / domains/ Skills from the competency tree	LEARNING OUTCOMES				
	Plan - Find Relevant Information	Identify and Scope - Search Information	Manage and Communicate Information	Digital Competence Regarding Fake Content	Identify, evaluate and avoid fake information
Declarative Knowledge - an association between two or more objects – facts, jargon, and acronyms. Content must be memorized.		*The learner will be able to search for the background information on a specific topic and to analyze the already available sources *The learner will be able to recognize information sources and identify the different text formats		*The learner will be able to apply information integrity criteria to analyze information and disclose fake content	*The learner will know how to check the facts and to find the sender of the information *The learner will know how to analyze the purpose of the information and who is benefiting from it *The learner will be able to use critical thinking in order to detect fake news
Conceptual Knowledge - grouping of similar or related ideas, events, or objects that have a common attribute or a set of common attributes.	*The learner will get knowledge of different search techniques and tools *The learner will know how to define search strategy and choose a suitable search tool *The learner will be able to formulate a search question	*The learner will be able to recognize information sources and identify the different text formats *The learner will know how to use Library Guides *The learner will know how to identify a search topic *The learner will be able to apply the principles of effective searching	*The learner will demonstrate awareness of issues related to copyright and creative commons		
Rules-based Knowledge - a statement that expresses the relationships between concepts. Rules provide parameters dictating a preferred behavior with predictable results.	*The learner will be able to identify a personal need for information *The learner will demonstrate knowledge about strategies for effective searching and search techniques *The learner will be able to identify the information gaps	*The learner will be able to use/follow library guides and recommendations *The learner will demonstrate knowledge about using keywords and search words			
Procedural Knowledge - a series of steps that must be followed in a particular order to reach a specific outcome.			*Learners will be able to cite and refer sources *Learners will be able to apply information integrity criteria to analyze information *Learners will be able to choose true and unbiased information *Learners will be able to distinguish between real and fake content, especially in the news and social media channels *Learners will be able to investigate the anatomy of the fake news environment	*Learners will be able to apply the search skills related to the scientific information source *Learners will be able to verify the genuineness of the scientific information sources	
Soft Skills - non-sequential guidelines for dealing with social interactions					*Learners will be able to verify which are the potential reasons behind the publication of fake news *Learners will be able to understand which are the potential advantages behind the public misconception *Learners will be able to understand the complexity lying behind a fake news and all steps done to arrive to people as a plausible, credible story

STEP 4 >

Design Game scenarios and learning activities

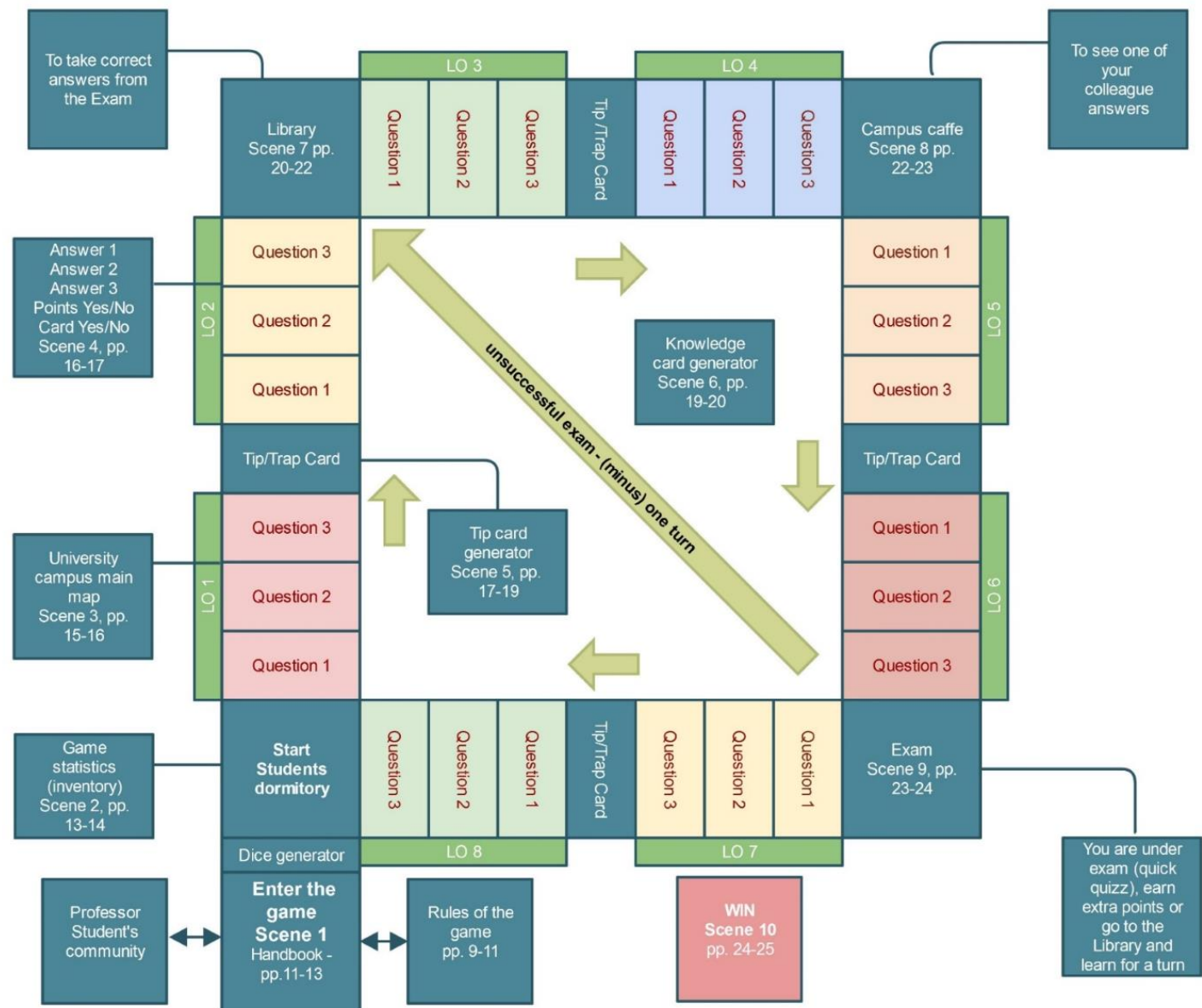


Game 1 goal: Primary goal: The students to be aware of the different types of information sources, the specifics of structuring their content, purpose and use.

□ Secondary goals:

1. Identify the personal needs of information (Plan - Find relevant information).
2. Apply the problem-solving techniques (Plan - Find relevant information).
3. Use instructions and guides in the different types of library environments (Identify and Scope - Search Information).
4. Identify the elements of information and the relationship between them (Plan - Find relevant information).
5. Recognize the ethical norms and the different types of licenses related to the digital content (Manage and Communicate Information).
6. Recognize citations and references and the different styles (Identify and Scope - Search Information).

STEP 5 >



Narrative description of the game plot

□ The main story: You are first year humanitarian student but still cannot distinguish between different kind of sources. Discussing curriculum topics with your colleagues you often get useful information but sometimes you are misled with useless advices too. You already know that in order to go further with your humanitarian education and to be better student you should learn principles and nature of the Information resources. How to identify, scope, plan, gather, evaluate, manage, present traditional and digital content is your main priority now. Move around the campus and library to look for answers of your questions, improve your information skills and demonstrate your knowledge and skills in front of professor Mad. Be the best among your colleagues and convince him that you are the best choice for the upcoming Summer Student Library Conference in Timbuktu (SSLCT).



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