

RAYUELA NEWSLETTER



Newsletter Issue 1 | December 2020 | HORIZON 2020 Programme | Contract No. 882828

Cybersecurity is one of the Commission's priorities in its response to the Coronavirus crisis, which has witnessed increased cyberattacks. RAYUELA (01/10/2020-30/09/2023) is a project specifically conceived to address this sensitive issue, offering an unprecedented response in full alignment with the key objectives of the Commission's Research and Innovation framework programmes. RAYUELA brings together law enforcement agencies, sociologists, psychologists, anthropologists, legal experts, computer scientists, ethicists, philosophers and engineers to develop innovative methodologies for enhanced cybersecurity. The stakeholders involved will achieve a better understanding of the factors affecting online behaviour related to new digital attack vectors and cyber-criminality, and boost the potential of young talents in the adoption of cybersecurity and advanced technologies.

RAYUELA's main goal is to better understand the drivers and human factors affecting cyber-criminality, thus empowering and educating young target groups to a more conscious and aware use of the Internet through gaming, in a preventive and mitigating action to reduce cybercriminal behaviour.

Grant amount received from the European Commission for this project will be spent on various tools and activities, including development of the online game for children, teaching and educational materials, conferences, workshops and other events.

The stakes are high, but we are convinced that we can deliver if we remain motivated and committed to working together efficiently and effectively. We are very proud of this project and eagerly looking forward to its impact and success in the near future!

Team Rayuela



This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 882828



WHAT YOU WILL FIND IN OUR NEWSLETTER

PROJECT IN NUTSHELL	3 - 4
WHY RAYUELA	5
PROJECT AIMS	6
COORDINATING INSTITUTION	7
RAYUELA NEWS	8 - 12
UPCOMING EVENTS	13
OUTREACH	14



This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 882828

PROJECT IN A NUTSHELL



RAYUELA aims to bring together law enforcement agencies (LEAs), sociologists, psychologists, anthropologists, legal experts, computer scientists and engineers, to develop novel methodologies that allow better understanding the factors affecting online behaviour related to new ways of cyber criminality, as well as promoting the potential of these young talents for cybersecurity and technologies.



RAYUELA's main goal is to better understand the drivers and human factors affecting certain relevant ways of cybercriminality, as well as empower and educate young people (children and teenagers primarily) in the benefits, risks and threats intrinsically linked to the use of the Internet by playing, thus preventing and mitigating cybercriminal behaviour.



Project focuses on cybercrime, which has a significant cross-border impact among the EU countries, but also outside the EU. Specifically, the document is addressed to cybercrime related to children, teenagers and young adults, which happen to be one of the most vulnerable populations in the EU, who must be protected and nurtured to stay safe online.



RAYUELA proposes a series of solutions to help the EU in the prevention, investigation and mitigation of cybercrime related to online grooming, cyberbullying and human trafficking, while incorporating the perspective of gender and cultural diversity.



Dissemination of the project's activities and results are essential for the successful exploitation of the innovative solutions developed by RAYUELA. RAYUELA's innovations offer high replicability across the EU. The need to raise awareness across value chains is directly related to the success of the project.



RAYUELA's consortium brings together 17 partners from 9 different EU Member States (ES, BE, SK, EE, PT, UK, GR, LV, DE). The consortium has been built with great care, looking for a group of excellent partners with proven expertise and who can fully provide the necessary know-how in the fields addressed by the project.

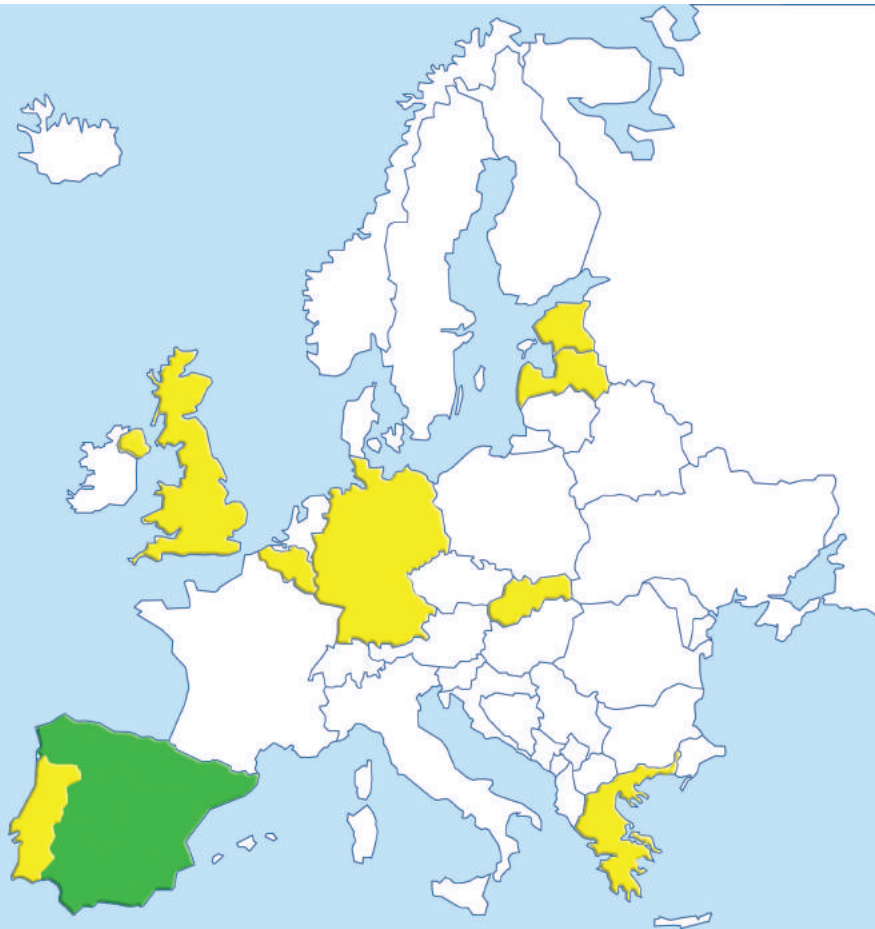
3



This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 882828

PROJECT IN A NUTSHELL

- | | |
|---|---|
|  | 1. UNIVERSIDAD PONTIFICIA COMILLAS (coordinator)
2. ZABALA INNOVATION CONSULTING, S.A.
3. UNIVERSIDAD POLITÉCNICA DE MADRID
4. FUNDACION TECNALIA RESEARCH & INNOVATION
5. AYUNTAMIENTO DE VALENCIA |
|  | 6. TIMELEX
7. UNIVERSITEIT GENT
8. UC LIMBURG
9. ALL DIGITAL AISBL |
|  | 10. BRATISLAVA POLICY INSTITUTE |
|  | 11. TARTU ULIKOOL
12. POLITSEI- JA PIIRIVALVEAMET |
|  | 13. MINISTÉRIO DA JUSTIÇA |
|  | 14. POLICE SERVICE OF NORTHERN IRELAND |
|  | 15. TILDE SIA |
|  | 16. ELLINOGERMANIKI AGOGI SCHOLI PANAGEA SAVVA AE |
|  | 17. NEC LABORATORIES EUROPE GMBH |



WHY RAYUELA

The project brings together law enforcement agencies (LEAs), sociologists, psychologists, anthropologists, legal experts, ethicists and philosophers, computer scientists and engineers, to carry out a thorough research on the sociological, anthropological, and psychological factors affecting online behaviour and cybercrimes, such as online grooming, cyberbullying, or human trafficking, as well as on the technological threats associated to the use of Internet of Things (IoT) devices, such as wearables or virtual assistants. The main findings of this research will be translated into an interactive story-like game in which these topics will be addressed through different cyber-adventures in which players may end up in a risky or safe situation depending on the decisions they made. Thus, the players may “live” different stories depending on the decisions they made while playing (and learnt from them), the same way as the well-known Cortázar's novel (Rayuela/Hopscotch) involves different stories depending on the decisions the reader makes while reading it.

The data gathered through the game will allow modelling, in a friendly and non-invasive manner, online habits and risk profiles related to cybercriminality based on a large and diverse sample covering the most representative geographical areas in Europe, thus providing LEAs with scientifically sound foundations to define appropriate policies. In addition, on the contrary to traditional research approaches where the impact on target users is unclear, in this case the target population will get the main takeaways directly by playing the game. The minors may fail avoiding risky situations in the Internet at first, but they will have the chance to try again and learn how to avoid them in a safe environment, the same way that kids learn how to make the pebble climb up from Earth into Heaven in the hopscotch game.

“Hopscotch (rayuela) is played with a pebble that you move with the tip of your toe. The things you need: a sidewalk, a pebble, a toe, and a pretty chalk drawing, preferably in colors. On top is Heaven, on the bottom is Earth, it's very hard to get the pebble up to Heaven, you almost always miscalculate and the stone goes off the drawing. But little by little you start to get the knack of how to jump over the different squares and then one day you learn how to leave Earth and make the pebble climb up into Heaven”

Julio Cortázar, Hopscotch, 1963 (1966 in English)

So you may ask yourself what is the Heaven of our particular RAYUELA. The answer is that none other than contributing to make the Internet a safer and better place for our children. Do you want to join us in this exciting adventure? If so, stay connected with us through the project web page and social media.

5



This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 882828



PROJECT AIMS

RAYUELA aims to bring together law enforcement agencies (LEAs), sociologists, psychologists, anthropologists, legal experts, ethicists and philosophers, computer scientists and engineers, to develop novel methodologies that allow better understanding of the factors affecting online behaviour related to new ways of cyber criminality, as well as promoting the potential of these young talents for cybersecurity and technologies, thus addressing the main 'pillars' of the already mentioned EU BIK strategy. And the project proposes to achieve these goals by playing, which represents a novel approach and a new method to investigate and mitigate cybercriminal behaviour which, although in this project will be specifically applied to some ways of cybercriminality, opens a research line to apply it to any other in the future. Thus, the main goal of this project is to provide LEAs, public administrations, the EU citizenship and, especially, young people and their environment (parents and educators) with valuable information and recommendations to define appropriate policies and measures to combat cybercrime.

To this end, RAYUELA will develop a serious game environment (e.g. interactive and interwoven storylines on cybercrime) to act as an enabler and amplifier of the project's research methodology, which will allow modelling, in a friendly and non-invasive manner, online habits and user profiles related to cybersecurity and cybercriminality based on a large and diverse sample covering the most representative geographical areas in Europe.

The project's research methodology together with the analysis of the massive data gathered through the serious game will provide LEAs with scientifically sound foundations to define appropriate policies and measures. RAYUELA's serious game will have an educational purpose whenever possible and additional educational material will be also produced as an outcome of the project, which is also aligned with the BIK strategy and is expected to have a positive impact on mitigating cybercrime. In addition, the game will pay especial attention to drivers for new forms of cyber criminality, such as the ever-increasing number of internet-connected devices (IoT) or the dissemination of 'cybercrime-as-a-service' (CaaS) business models.



COORDINATING INSTITUTIONS



Universidad Pontificia COMILLAS is a private university located in Madrid (Spain). Founded in 1908, ICAI is COMILLAS Engineering School (<https://www.icaicomillas.edu>) focused on industrial and telecommunication technologies. With +1,200 students, +300 professors and researchers, and +240 international agreements, ICAI has a strong focus on R&D activities, with +75 funded innovation projects and aggregate investments of +€5M. On the other hand, CIHS (<https://www.chs.comillas.edu/en/>), COMILLAS' expertise in psychology, criminology and anthropology also contributes towards building a solid knowledge base on the main drivers for cybercrime.



In this project, ICAI is represented by its Institute for Research in Technology (IIT). The IIT is a university institute from the ICAI School of Engineering devoted to research and training of researchers on technological fields. It is a non-profit institute, which aims to be flexible and pragmatic in the way it works. It gathers more than 60 researchers and over 40 full time doctoral students. It is an interface institution working with the industry in a self-supported base with an annual budget over €5M. Its main activities focus on the design and development of computational models to perform techno-economic analyses, as well as on advising and consultancy tasks.





KICK-OFF MEETING 1st - 2nd of OCTOBER 2020

The first projects 2 days kick-off meeting was organized by COMILLAS and due to the circumstances it took place in the online environment, connecting more than 40 experts from different countries. The discussion was focusing on the main aim for the project and contribution to raise awareness of internet's potential risks among children and young adults. During this meeting and for whole duration of project RAYUELA brought together a multidisciplinary team of experts from all around Europe to develop a story like game that will tackle the cybercrimes. Each leader of working group introduced the core of the working package and the activities and aims which would be reached in near future.

KICK-OFF MEETING 1st - 2nd of OCTOBER 2020

1st day Agenda:

1. Introduction:

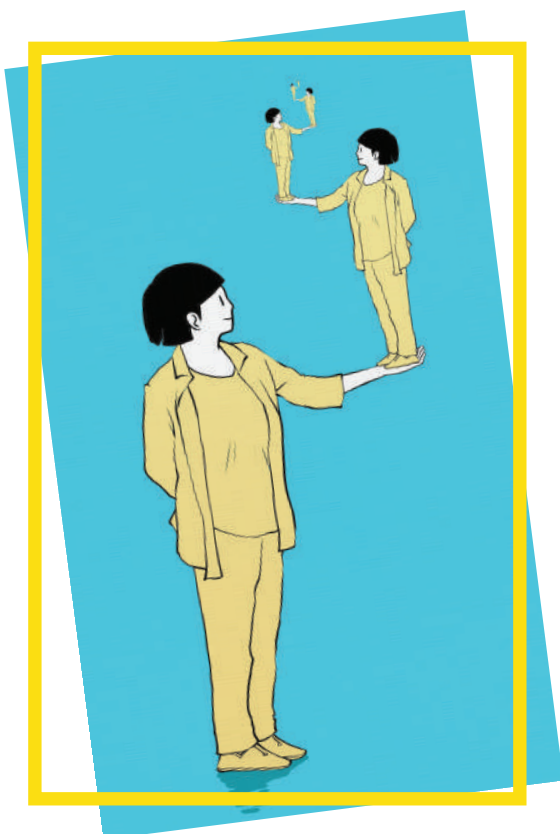
Gregorio López, COMILLAS

2. Technical session I.

Nereida Bueno, COMILLAS: WP1 Online Grooming, Cyberbullying and Human Trafficking

Manuel Álvarez, UPM: WP2 Technology Assessment & IT Threat Landscape

3. Networking



2nd day Agenda

1. Introduction and Officer Presentation

Markus Walter, Research Executive Agency: Guidelines and recommendations

2. Technical Session II.

Ana Moya and Leire Bastida, TECNALIA: WP3 Development of a Cyberadventure Serious Gaming Environment
Stephanos Cherouvis, EA: WP5 Gathering Insights via Pilot Studies Across the EU

3. Technical Session III.

Gregorio López, COMILLAS: WP6 Data Analysis & Interpretation on Profiles from Young Victims & Offenders
Viera Žúborová, BPI: WP7 Communication, Dissemination & Training for Cybercrime Prevention & Awareness

4. Technical Session IV.

Pieter Gryffroy, TIMELEX: WP4 Online Privacy, Data Security & Ethics
Gregorio López, COMILLAS: WP9 Ethics Requirements
Violeta Vázquez, ZABALA: Final Conclusions



EUROPEAN RESEARCHER'S NIGHT EVENT

27th of November 2020

The coordinator of the RAYUELA project Dr. Gregorio López López presented the project in the European Researchers' Night event about cybersecurity for the whole family organized by Universidad Pontificia Comillas. The event included talks from Policía Nacional, Guardia Civil, and INCIBE to raise awareness and educate families on good practices in the Internet, as well as funny Questions&Answers games for the whole family and a Capture The Flag competition for young hackers

RAYUELA REPORTING TRAINING WORKSHOP

12th of November 2020

On the 12th of November the PMO led by ZABALA provided an internal TRAINING WORKSHOP in order to ensure the coordination of the Consortium in Managerial Issues.

This type of events ensures the smooth implementation of the project, since it establishes a common method to follow RAYUELA's financial and managerial aspects.

10



This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 882828



WP 7 TRAINING 14th of December 2020

In this Training a detailed information about the dissemination and communication strategy was presented by BPI team. Training was focusing on the visual identity of the project created by BPI including logos, templates, different communication channels and also on the obligation of the partners and the consortium on how to communicate and disseminate results of the projects according to the rules of Horizon 2020 and European Commission.

RAYUELA TEAM CHOOSE THE LOGO!

A fun way to fight cybercrime was the sentence that was elaborated further and incorporated also in the second logo proposal for RAYUELA project. Intention was to connect it to the world of childhood, with familiar signs that were visible through various generations playing games all over the world, and societies. As in every game you must select your preference steps, and simple geometric symbols lead you to the direction, it might be right and even wrong. It's as life, it's up to you, which way you will go, if you choose yes or no, but all depends on your skills and knowledge. Every obstacle is surpassable.

LEA Cluster

RAYUELA is delighted to have joined the LEA cluster, initiated and co-ordinated by the CC-DRIVER project. The cluster brings together eight H2020-funded projects – CC-DRIVER, COPKIT, DARLENE, INSPECTr, PREVISION, PROTAX, RAYUELA and ROXANNE – in an effort to join forces in supporting law enforcement crime investigations.



UPCOMING EVENTS

ETHICAL WORKSHOP **21st of JANUARY 2021**

Work Package 4 will be organizing a data protection and ethics workshop in January 2021 to ensure that legal and ethical elements are part of the project from the outset and that questions can be raised and discussed.



13



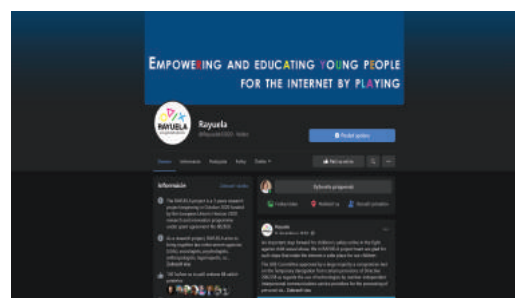
This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 882828

OUTREACH

Launch of the social media platforms

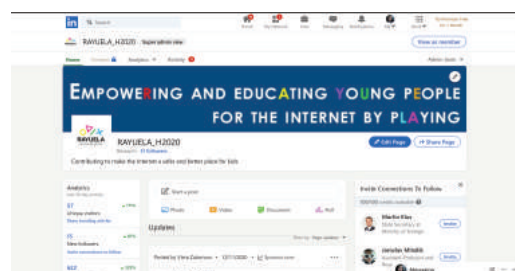
Facebook

We have chosen Facebook as a relevant platform for engaging citizens at large, but does not allow effective targetization of professionals and stakeholders, therefore it will be mostly used to target wider audience. RAYUELA's Facebook page will also focus at establishing direct communications with target audiences, both in terms of other relevant groups as well as individuals.



LinkedIn

LinkedIn will be used mainly as a platform to engage expert discussions and promote project-related articles/updates. Current LinkedIn group will serve as platform for discussion, interaction, collection of information, and communication of the project outputs, to experts (from research, industries, SMEs, NGOs, local authorities, etc).



Twitter

Twitter will be used few days before activity will take place, during and initiatives and/or partners' staff so as to raise awareness on the event/initiative and advertise the activities which are being carried on. The live twitting will be used to keep the momentum and soon after events where RAYUELA is present with raise the attention of internet community.



PROJECT DATA

PROGRAMME: H2020-SU-FCT01-2019

Sub-topic 2: Understanding the drivers of cybercriminality, and new methods to prevent, investigate and mitigate cybercriminal behaviour

TYPE OF ACTION: Research and Innovation Action (RIA)

DURATION: 36 months (1 oct 2020 – 30 sept 2023)

PROJECT BUDGET: € 4 978 040 (EU contribution: € 4 974 290)

CONSORTIUM: 17 partners from 9 European countries

COORDINATOR: COMILLAS

project coordinator: Gregorio López

e-mail: gllopez@comillas.edu

web: <https://www.rayuela-h2020.eu>

facebook: <https://www.facebook.com/RayuelaH2020>

linkedin: <https://www.linkedin.com/company/rayuela-h2020>

twitter: https://twitter.com/RAYUELA_H2020



This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 882828

