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#### HEAD OF REGISTRO .IT

Marco Conti

# Quarter in short

# Here's how 2022 ends for the Registro .it

by Francesca Nicolini

2022 takes leave with the 35th anniversary of .it, falling on 23 December. At the end of the year, however, it's time to sum up and measure the annual growth of the .it, down compared to the surveys of the pandemic years (only +0.50%). The last quarter is also an opportunity to remind us that the Registro, promoter and organiser of the Internet Festival, has been present at the October 2022 edition with its events dedicated to the online business of professionals and companies wishing to grow, and to the digital education of the very young on good use of the Net, as well as on risks and pitfalls to avoid online

The end of 2022 leaves us of an important date, 23 December 1987, the day and year when, at CNR-CNUCE, the first .it domain name, cnuce.cnr.it, was registered: exactly thirty-five years have passed since that date, which also celebrates the birth of Registro .it, boasting on February 2023 more than 3,800,000 Italian-branded domains. Speaking of numbers, the Registro's end-of-year report, outlines a decline for new .it names (in fact, the 2022 increase is only +0.50%), compared to previous years, although in line with the trend (related to domain name registration) declining worldwide. While the increase in new domains in the two-year pandemic period (2020-2021) had boded well for the revival of activities bent by the restrictions imposed by the government, online presence remains the mainstay of the economic recovery, and 2023 is already shaping up to be the year of potential growth for .it names and sites.

The period from 6 to 9 October, however, brings us back to the Internet Festival, the annual event on the Web, which has been held in Pisa, Italy, for 11 years now. As every year, the Registro is among the promoters of the initiative, and at the same time participates with targeted events dedicated to companies and professionals who want to improve their online business through proper digital transformation and communication. The Internet Festival has also hosted, since its birth, the events of Ludoteca del Registro, which this year presented its Manifesto with the Decalogue on Cybersecurity for Connected School: the manifesto entitled "A scuola di cybersecurity (Learning Cybersecurity)" outlines the 10 rules that the very young must know in order to safely surf the Web. Registro doesn't stop here. Along with What a Digital World, it addresses the changes in a society becoming more digital with new episodes on Quantum computers and the importance of Big Data, as well as new episodes on useful conversations for the online presence of SMEs and all those who want to invest in digital business.

Happy reading!



An outlook on emerging technologies, young people and digital enterprises at IF2022

By Chiara Spinelli



Twelfth edition concluded for the 2022 Internet Festival, finally back "live" after the acute phase of the pandemic, yet maintaining its digital dimension with live streaming of the main events and with a "train" of other events through December, that took place online on IF's social channels.



This year's events of the CNR Institute of Informatics and Telematics (CNR-IIT) of Pisa, and those of Registro .it, were all held within the Pisa Research Area, with the specific intention of "opening the doors" of Pisa citadel of science and bringing the public even closer to the CNR.

On Thursday, 6 October and Friday, 7 October, Ludoteca of Registro .it organised the first edition of a new format, the Cyberpark, a playful-educational journey dedicated to the theme of cybersecurity, targeting primary and secondary school children, in which twelve classes from three Pisan institutions participated.

"Ma siamo sicuri? A scuola di Cybersecuirty (Are we safe? Learning about Cybersecurity)" was also held on 6 October, an event bringing digital literacy experts, educators and entrepreneurs to the stage to discuss the relationship between cybersecurity and schools. During the event, the first Online Safety Manifesto was presented, dedicated to Italian students, containing the ten rules to learn and follow in order to surf consciously and safely. In the afternoon of the same day, a digital marketing course dedicated to businesses, another key target of the dissemination of digital culture operated by the Registro in recent years, was also held, attended by expert lecturers in the field, such as Gianluca Diegoli, Miriam Bertoli, Alessandra Farabegoli, Enrico Marchetto and Paola d'Arcangelo, with fifty businesses in attendance.

The morning and afternoon of October 7 were dedicated, as always, to the Cybersecurity Day 2022, the annual event dedicated to cybersecurity organised by CNR-IIT together with representatives from institutions, scientific research and business. In particular, during the morning a focus session took place, dedicated to schools, on job opportunities in the industry.

Grand finale, Saturday afternoon with the event organised in collaboration with Ansa "The Next Big Things - The Next Big Internet Revolutions", dedicated to the frontiers of computer research on artificial intelligence and quantum internet. The event, broadcast live on the Ansa portal and hosted by journalist Alessio Jacona, saw the participation of great protagonists, among others, internationally known researchers such as Yoshua Bengio, 2018 Turing Prize, Maria Chiara Carrozza, president of the CNR, Anna Grassellino, director of Fermilab in Chicago, and IMB Europa vice president Alessandro Curioni.





## **Growth of the New Registrations**

The analysis of .it name registration trends shows that, overall, new domains outnumber cancellation procedures, with significant peaks in September and October. The total difference over the last four months of 2022 is more than 18,000 domains, lower than the equivalent four-month period last year. The trend shows that in the last months of 2022 (as already observed for the second quarter) there is a decrease in new registrations, compared to the same period in recent years



# **Top Regions**

In the last four-month period, Lombardy's share of new registrations remains unchanged at 20%, compared to the same four-month period in 2021. Lazio, although confirmed in second place, loses one percentage point to 12%. Good performance for Campania and Veneto, on the contrary, increasing by one percentage point to 10% and 8%, respectively. The percentages of Emilia Romagna and Piedmont remain unchanged, compared with the last months of 2021



# Yearly growth

The total number of registered .it domain names amounted to 3,467,693 at the end of 2022, a positive growth of just 0.50% (17,356 more domains), compared to the end of 2021. This slight increase is significantly lower than the trend in recent years



# **Entity Types**

Compared to the second quarter of 2022, the percentage of new .it domains related to individuals increases by four points to almost 50%. The percentage for freelancers also increased by one point, to the detriment, however, of businesses, losing as much as five percentage points, settling at 32%.



				2	7660
	16783				
9144					
15000	18000	21000	24000	27000	30000
10000	10,700	61999	24000	21000	- www.ww



## **Reasons for oppositions**

In the latter four-month period, infringement of the company's distinctive signs is the main reason (96%) for initiating an opposition: a trend confirmed in the rest of the year, with 86% in the first 2022 four-month period and 98% in the second. The remaining 4% of the grounds, subject of disputes, are broken down as follows: 3% were requested for the purpose of protecting names/surnames, while 1% fell under "miscellaneous".



## **Oppositions - Reassignements relationship**

From September to December, of the 79 oppositions initiated, 48 involved Italian subjects, either as assignee or opponent. In contrast, 17 are the cases in which co-nationals have set up opposition applications over domain names against foreign assignees. In 9 cases, some domain names assigned to non-Italian parties were disputed by as many foreign parties. Finally, 5 are the cases in which a foreign party initiated the opposition procedure

over a domain assigned to an Italian party. In 2022, out of 261 initiated opposition procedures, 163 were undertaken among co-nationals; 65 foreign assignees were disputed by Italians. In 17 cases, non-Italians started opposition procedures against conationals. Finally, an opposition procedure between two foreign subjects was started in 16 cases.

Out of the 12 total reassignment procedures, slightly more than half (7) saw Italian subjects involved, either as respondent/ assignee or as complainant/opponent. 3 cases have witnessed co-national assignees initiating procedures against foreign subject complainants. In the remaining 2 cases, the disputed domain, assigned to a foreigner, was disputed by a domestic entity. In 2022, there are 41 total reassignments, of which: 22 national subjects took part in the procedure in their dual capacity of respondent/assignee - complainant/opponent; 9 co-nationals started the procedure against foreign assignees.; 6 national respondent/assignee were involved in the procedure by foreign complainant/opponent; in 4 procedures both parties are foreign



# Monthly Trend of the Oppositions

In the third quarter, the total number of oppositions initiated amounted to 79, with an average of about 20 set up oppositions per month. The largest number of oppositions (25) was reported in November. In brief, to summarise the 2022 data and the trend of initiating opposition procedures:

 in the middle four-month period the highest number of initiated procedures is reported (54 in June), along with a higher average than in the period of observation of this issue (28);
in the first four-month period, on the other hand, the average is 18 initiated procedures, then increasing to 20 in the last four-month period. The lowest number of initiated procedures, 12, was reported in January. The annual average is 22 procedures activated



# Yearly trend of the Oppositions - Reassignements

Oppositions in 2022 total 261; figure virtually unchanged (-1) from the previous year. The PSRDs implemented 41 reassignments, one more procedure than in 2021. It is possible to state that this year the figure is steady, both with regard to the initiation of opposition procedures and reassignments.

Specifically, in reference to reassignments: the College, in 30 cases, at the end of the procedure, has recognised the rights of the opponent/complainant; in doing so, by granting

the application, it sanctioned 400 the transfer of the domain name; in 7 cases, on the 350 other hand, the domain name remained assigned to the 300 assignee/respondent; in one 250 case, the termination of the reassignment procedure was 200 decreed by the College; and, finally, there are 3 procedures pending the ruling 100 by the College.

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### **Authinfo requests**

In the third quarter of 2022, we issued authinfo codes for 19 domain names under the "no-registrar" status due to termination of the contracts of Registrars maintaining them. Only for one domain, however, the Registrar was active

#### 250 217 200 150 89 100 55 50 37 31 28 10 13 13 12 10 0 Registrare involved 2021 2022 Domains involved

## **Requests from competent authorities**

Almost unchanged from the second quarter was the amount of requests from competent authorities, which involved 26 domain names



### **Reserved names**

21 reserved domain names have been registered





# Verification of domains by Registro

A total of 123 verifications were conducted involving 137 domain names. The figure is in line with that of the previous four-month period. The verifications led to the revocation of 114 domains

# .it News

2022, a year of stasis for .it, but growth is around the corner

Happy birthday .it: Italy online for 35 years!

What a Digital World: let's discover the potential of Quantum computing and Big data

Digital Talks, the new dialogues for online business success

Guidelines: how to start the opposition procedure

Ludoteca of the Registro .it: at school with the ten rules for the cybersecurity

Ludoteca attending the events dedicated to students and education



# 2022, a year of stasis for .it, but growth is around the corner

by Stefania Fabbri and Maurizio Martinelli

The Registro ends 2022 counting 475,768 new domains for a total of 3,467,693 registered .it names, 0.50% more than in 2021.

The .it has grown remarkably in the previous two years (2020-2021), thanks to the exponential presence on the Net of self-employed freelancers, companies and enterprises, irrefutable proof of the great opportunity offered by the Net. The climb to the top, however, comes to a halt in 2022, with a slowdown in the market for Italian Internet domains. As a matter of fact, this trend is not isolated and confined to the Italy: even at the global level there is evidence of a lull probably due -in part- to the latest international events, characterised by health emergencies (still ongoing), geopolitical crises and repercussions on consumption, businesses and citizens' expenses, in addition to increases and price hikes on services. When compared with 2021 figures, the numbers from the CNR-IIT study on the spread of the Internet, as measured by the .it metric\*, reveal that only registration requests from foreigners, up 66.7%, and self-employed freelancers (up 3.1%) have increased, while names assigned to individuals such as those registered by businesses (down 14.7%), public entities (down 13.9%) and the nonprofit sector (down 14.5%) have dropped by 29%.

Geographically, the situation remains unchanged, with the North leading the way with the highest penetration rate in the country with 384.9 domains per 10,000 inhabitants, followed by the Centre (378.1) and the South and Islands (236.4). It is Milan holding the record for penetration rate with 559 domains per 10,000 inhabitants, followed by Bolzano (495), Florence (462), Rimini (451) and Bologna (443).

With this in mind, it can be argued that the current period of economic and social uncertainty is reflected in the 2022 numbers for .it, a year of subdued growth, but with very high potential. For this reason, 2023 could prove to be a watershed year for Italian domains and for the country's entire digitisation plan.

\*The .it metric calculates the index of Internet penetration in the country based on the penetration rate for each region and province, (i.e., how many .it domains are registered per 10,000 inhabitants)



# Happy birthday .it: Italy online for 35 years!

by Francesca Nicolini

Seven decades have passed since that far 23 December 1987, when the first of the domains of the National Net, cnuce.cnr.it, was registered at the CNUCE Institute of the CNR: with the first Italian-branded name, under delegation from the American authority IANA (Internet Assigned Numbers Authority). At the same time, Registro.it was also born, the .it name registry, managed since the very beginning - by the Institute of Informatics and Telematics of the CNR of Pisa (CNR-IIT), successor of the CNUCE, by virtue of the technical and scientific expertise gained by its researchers

Thirty-five years later, on February 2023 .it names have reached six figures and number more than 3,800,000, settling in fourth place at the European level, and seventh at the global one, in the 2022 Top Level Domain (ccTLD) country code ranking.

In 1987, with the www still being a long way off, only .com, .net, .org domains existed: only later was it decided to identify each country on the Web with a two-letter extension (.it, .de, .fr, etc.), thus giving birth to country code Top Level Domains (ccTLDs). Italy did not hesitate to embark on the new adventure of national domains on the Web, already a protagonist and aware of another record achieved again at the CNR-CNUCE the previous year: on 30 April 1986, the first Italian connection to the Internet had been made, the result of the work of researchers at the then CNUCE (National University Computing Center, founded in 1964 as the computing center of the University of Pisa - C.N.U.C.E. - and later, in 1974, passed to the CNR, keeping the name and simply losing the dots to maintain the link with the past). From Pisa a "ping" departed, a signal headed to the United States, Roaring Creek, Pennsylvania, which traveled on satellite "roads", inaugurating the Italian Internet.

And it was at the CNUCE, twenty months later, that IANA authorized the CNR for the registration of .it domains, thanks to the technical and scientific expertise of its researchers and experts, fourth in order of time in Europe to adopt the Internet Protocol (IP). Thus Registro.it was born, the registry of .it names, managed by the Institute of Informatics and Telematics in Pisa, heir to the CNUCE. At the very beginning keeping a manual "registry" of the unique address (IP) consisting of a series of digits, which identified each individual computer, was fine. Later, as the number of requests for registration increased it was decided to give names to those numbers, easier to remember, thus breaking down the space of the Net into zones and inaugurating the Domain Name System, (DNS).





# What a Digital World: let's discover the potential of Quantum computing and Big data

by Stefania Fabbri

Season 2 of What a Digital World (WDW) continues with the release of two new episodes dedicated to Quantum computing and Big data, "hot" topics in technological innovation, not always easy to understand.

In episode number four, with the help of animations from our series, we'll explore quantum computers to understand from which need the idea of harnessing the laws of quantum mechanics came from, how they work and what opportunities they will offer in the near future.

But will these new computers completely replace the "classic" ones? In the short term this will certainly not be the case; the computers we currently use are perfect for our daily use, but most importantly - they are needed to program and give instructions to quantum computers.

Even now, large companies are investing in building quantum computers made available to the scientific community allowing researchers to identify the most "suitable" uses for this new technology: from Big data applications to improving large-scale processes such as "smart grids", enhancing machine learning processes, artificial intelligences, nanotechnology and biochemistry.

From the world of quantum, let's move on to the world of Big Data, the focus of the fifth episode, to explore the potential of this ever-and-rapidly-expanding dataset of different types, partly created by gradually moving our lives to the Web. As we live our daily lives, we grow the data count by performing the most common actions: a post, a photo on Instagram, an online purchase, or even just paying with a credit card at a store. These digital tracks of ours are collected, mostly for marketing purposes, to analyse and extract information, even complex one, through the use of algorithms and artificial intelligence systems able to identify data of interest scattered among trillions of bytes. Big Data analysis is not only useful for user profiling purposes, but has proven to be extremely important in areas of public interest such as, for example, health care. If you are able to find the right data, interpret it and relate it to each other, you can use it to find answers to the problems we all share, from small to large, and improve everyone's life.

All episodes of the second series are available on the website and on Registro's social channels, enjoy!

# **Digital Talks**, the new dialogues for online business **SUCCESS**

by Stefania Fabbri

Digital Talks, Registro's format aimed at SMEs and whoever wants to get closer to the world of digital communication, concluded its 2022 edition with two fall appointments dedicated to the importance of developing an action plan to take good advantage of the possibilities offered by digital marketing.

Today, social networks are very powerful communication channels helping companies, SMEs and professionals finding their target audience. In order to fully harness the potential for business and promotion, however, it is essential to have a targeted advertising strategy, otherwise social media advertising risks being costly and ineffective.

On 27 October, Gianluca Diegoli met with Enrico Marchetto, Social Media Strategist and Cofounder of Noiza, who provided excellent advice on what the best way to invest in advertising on Facebook and Instagram might be.

On 15 December, the last episode of 2022 was dedicated instead to branding for SMEs: according to Erika D'Amico, Brand Strategist & Owner of Gazduna, the brand is a dynamic platform fed by the relationships with its stakeholders, going far beyond the facade of the logo. During the interview with Gianluca Diegoli, Erika D'Amico outlined a series of dos and don'ts for doing branding.

To learn more you can watch again this and also all other Digital Talks episodes on the or on Registro's Youtube channel



# Guidelines: how to start the opposition procedure

Setting up a proper opposition application is essential: to facilitate those who believe their right to the assignment of a given domain name has been infringed, and guide them in preparing the application to start the opposition process, the Legal Issues and Litigation Unit of Registro. it has developed ad hoc Guidelines to instruct the inexperienced user on the steps to take and the data to enter.

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The registration of a .it domain and any third-party's right conflicts Normative references, Regulations and guidelines

a) Regulations for assigning and managing domain names under the .it ccTLD (available at www.nic.it)

a) The registration of a domain name under the .it ccTLD is carried out on a first-come-first-served basis for subjects who have citizenship, residence or headquarters in the countries of the European Economic Area (EEA), the Vatican State, the Republic of San Marino, the Swiss Confederation and the United Kingdom

b) The regulatory system on the basis of which the Registro .it operates provides specific protection for a third party who, as the holder of a valid right, wishes to take extrajudicial action in order to obtain the assignment of a domain name already registered by another party

c) In this regard, in fact, Regulations provide users with the chance of activating an opposition procedure, the procedure for the Reassignment of a domain name, as well as Arbitration

d) Activating the opposition procedure for a domain name is a necessary condition for the applicant to have access to extrajudicial dispute resolution tools such as the Reassignment procedure and Arbitration

e) Pending an opposition:

- The domain name cannot be subjected to a registrant change;
- In the event that it is resolved in favour of the opponent, the domain name, for 30 days, can be registered only by the subject who proposed the opposition

b) Regulations for dispute resolution under the .it ccTLD (available at www.nic.it)

c) Technical and legal guidelines attached to the above regulations (available at www.nic.it)

d) General regulation on data Protection Data Protection Authority General regulation on data Protection - Regulation (EU) 2016/679 of the European Parliament and of the Council of 27 April 2016

e) Legislative Decree 10 February 2005, No. 30. Industrial Property Code, pursuant to Article 15 of Law No. 273 of 12 December 2002. In particular, reference is made to Art. 12, 22, 118 and 133

f) Regulation (EU) 2015/2424 of the European Parliament and of the Council of 16 December 2015 amending Council Regulation (EC) No. 207/2009 on the Community trademark, amending Commission Regulation (EC) No. 2868/95 implementing Council Regulation (EC) No. 40/94 on the Community trademark, and repealing Commission Regulation (EC) No. 2869/95 on the fees payable to the Office for Harmonization in the Internal Market (Trade Marks and Designs)

g) The Hague Convention of 5 October 1961 (Convention de La Haye du 5 October)

### Practical steps

a) Anyone can file an opposition, bearing in mind that the current Regulations allow the registration of a domain name only to individuals who have citizenship, residence or registered office in the countries of the European Economic Area (EEA), the Vatican State, the Republic of San Marino and the Swiss Confederation and the United Kingdom

b) The procedure may be filed either by the person concerned or on behalf of another person; in the latter case, the application must be signed by both persons. Otherwise, the representative is required to attach the relevant power of attorney to the application, submitting, in addition to their valid identity documents, that of the represented party

c) In order to obtain any domain name assignments, the procedure may be filed with one's own name and on behalf of a natural person or legal entity not eligible for a domain name assignment, provided that the representative gives evidence of acting as a licensee or by way of explicit grant of other right

d) In order to activate this procedure, sending the Registro an application is required. This shall contain:the sender's general information

- the domain name matter of the opposition procedure
- the grounds for objection and description, if any, of the
- damage suffered and/or the right allegedly infringered

e) The procedure is also activated, ex officio, when a notice on the existence of any judicial or administrative proceeding concerning the assignment of the domain name is received

f) The opposition shall be considered activated as of the date when the "challenged" status is attributed to the domain name, as communicated to the interested parties

g) In order to keep the opposition pending, the interested party is required to confirm the opposition to the Registro every 180 (one hundred and eighty) working days for no more than two times, without prejudice to the existence of any judicial or administrative proceeding related to the assignment of the domain name

h) Registro .it does not take part in the opposition procedure. The applicant, once the "challenged" status has been attributed, can access one of the extrajudicial dispute resolution tools



### Informations

a) On the Registro's website the forms, to be filled out and signed also digitally, for the activation of the procedure by Natural Persons and Legal Persons are available to users

b) The proxy and attached documents referring to entities not belonging to a member state of the European Economic Area (EEA), the Vatican State, the Republic of San Marino, the Swiss Confederation and the United Kingdom, must be transmitted to Registro .it authenticated and apostilled or legalized

c) In order to facilitate the investigation, it is recommended to attach to the application any most useful information and documents to prove the declared content

d) The description of the right infringed and the damage suffered must necessarily arise from the existence of an "absolute right" owned by the subject, such as, for example, the right to the distinguishing marks of a business, the right to one's own name and surname, and other rights recognized by the system

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# Ludoteca of the Registro .it: at school with the ten rules for the cybersecurity

### by Stefania Fabbri

We all spend time in the digital world today to work, study, have fun, and share experiences, all great opportunities that, in order to be fully enjoyed, require lucidity and awareness of the risks we might encounter. Therefore, the acquisition of digital skills cannot leave behind the elements related to cybersecurity, and this is precisely why the Ludoteca of Registro .it has decided to complement the workshops and tools on the subject with an online security decalogue dedicated to students of schools of all levels.

The "A scuola di cybersecurity ("Learning cybersecurity") manifesto, edited by Giampaolo Colletti (journalist, business manager and expert in new technologies, start-ups, digital work and social media), identifies the 10 rules that every girl and boy should know to safely navigate the web and social media, avoiding those behaviours that can put their data at risk or involve them in harmful relationships and contexts. A few, but important principles to follow in order to protect our privacy, shelter ourselves from malicious attackers and use social media properly, rules that apply in both the physical and digital worlds: from paying close attention to privacy, protecting our identity, data, passwords and codes on our devices to thinking carefully before taking any action, and avoiding trusting strangers too much.

The decalogue, launched in May and presented in its final draft in Pisa in October, during the 2022 edition of the Internet Festival, gathers not only the contributions of students and teachers who took part in the dedicated events, but also those of various stakeholders in the research and digital

ecosystem, including Alessandro Bencivenni (lecturer and @profdigitale on social media), Matteo Flora (cybersecurity expert), Guido Scorza (Component of the Data Protection Autority) and Barbara Strappato (Postal Police Division 1 Director).

On the Ludoteca website the final manifesto is available for downloading, to be read and discussed in class.

Finally, those who agree with the decalogue and its principles can, accordingly, sign the manifesto, which to date has more than 100 endorsers.







# LE 10 REGOLE PER NAVIGARE CONSAPEVOLI E SIC

### **SCEGLI CON CURA.**

Il primo passo è quello di adottare password alfanumeriche complesse. Quelle semplificate possono compromettere la sicurezza dei tuoi dispositivi informatici



### **CUSTODISCI GELOSAMENTE.**

Password e codici di accesso non vanno condivisi con nessuno. Ricordati che corri il rischio di diventare vittima di truffe online o di hackeraggio a causa di una banale distrazione



### PENSA PRIMA, CONDIVIDI POI.

Prenditi il tuo tempo: prima di rilanciare un contenuto, prima di mettere un like o un cuore, prima di pubblicare un selfie o postare un video rifletti bene e poniti una domanda: ne vale davvero la pena?



### FAI ATTENZIONE.

Ricorda che in rete e sui social tutto è pubblico, anche quello che può sembrare privato. Perché i contenuti online hanno una viralità difficilmente prevedibile. Quindi stai attento a ciò che decidi di condividere.



### USA LA TESTA, NON LA PANCIA.

Non rispondere in modo impulsivo. Parla, scrivi, chatta, ma con consapevolezza. Le parole hanno un peso. Scegli di interagire in modo tale da evitare di alimentare tutto questo.



# Ma siamo sicuri? A scuola di **Cybersecurity**

Il primo manifesto per la sicurezza online dedicato alle studentesse e agli studenti



#### **NON CADERE NELLA RETE.**

Perché in rete le fake news si moltiplicano su siti poco affidabili, presentati con video coinvolgenti e con titoli acchiappaclic, rilanciati spesso inconsapevolmente da profili di amici e conoscenti.



#### AIUTA CHI È PIÙ IN **DIFFICOLTÀ A COMPRENDERE** SOCIAL E RETE.

Diventa anche tu un influencer delle buone pratiche e spiega a tua mamma o a tuo papà, ai tuoi nonni e agli amici le opportunità di Internet, ma anche i rischi connessi.



### **NON FIDARTI!**

I tentativi di phishing e di truffe cibernetiche vengono talvolta messi a segno attraverso account di amici e parenti, spesso hackerati. Quindi anche i tuoi contatti più stretti, senza volerlo, diventano diffusori di malware. Fidarsi è bene, non fidarsi è meglio.



### ALZA LA MANO, MAI LE MANI.

Chiedi aiuto a chi ne sa più di te se pensi di trovarti in una situazione di rischio a causa delle interazioni in rete. Hai a disposizione un indirizzo sempre presidiato: vai su Commissariatodips.it e mettiti in contatto con gli operatori della Polizia Postale e delle Comunicazioni.



#### **TIENITI AGGIORNATO SUI RISCHI CHE SI CORRONO** QUANDO SI NAVIGA.

Cerca di cogliere i segnali che arrivano dagli esperti e impara ad essere prudente, a non fidarti ciecamente dei link condivisi e a ragionare prima di cliccare.

# Ludoteca attending the events dedicated to students and education

#### by Giorgia Bassi

In September, at the fourth edition of the HELMeTO (Higher Education Learning Methodologies and Technologies Online) international conference, organised in collaboration with the Institute of Educational Technologies of the CNR, Giorgia Bassi and Angela Franceschi of the Ludoteca of the Registro .it presented the paper "At cybersecurity school with Nabbovaldo: evaluation of a serious game" dedicated to the video game "Nabbovaldo and the cyber blackmail". In particular, the presentation highlighted the results of the project aimed at evaluating the effectiveness of workshops conducted in secondary schools in the 2021/22 school year.

If the HELMeTO conference, held at the University of Palermo, was a fruitful discussion among researchers and experts on the topic of distance and digital learning in education and training, equally important was the participation of Ludoteca's experts in Didamatica, an event organised in Milan by AICA (Italian Association for Informatics and Automatic Computing). In November, in fact, at the 2022 edition of Didamatica, a landmark event for students, teachers, educational institutions, ICT professionals, companies and public administrations on digital innovation topics, once again Giorgia Bassi and Angela Franceschi presented the paper "A video game to educate on cybersecurity", during the session "Game and Drones", focused on the importance of edutainment as a tool for spreading cybersecurity culture among younger generations.





# From the World

# EU green light for NIS2 directive

by Gino Silvatici

**Directive for the resilience of critical** stakeholders approved

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# KINDNS: ICANN promotes best practices on DNS security

by Arianna Del Soldato and Adriana Lazzaroni

## "Universal Acceptance" for a more inclusive and barrier-free Internet

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# EU green light for NIS2 directive

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On 28 November, the Council of the EU - after approval by the European Parliament on 10 November - adopted the NIS2 ("Network and Information Security" Directive) on the adoption of measures to ensure a high common level of cybersecurity across the Union.

Targeted by the directive are the energy, transportation, telecommunication, digital infrastructure, and banking and finance industries: in these areas, NIS2 will regulate cybersecurity risk management measures and reporting requirements.

Specifically, with regard to domain names, the NIS2 directive will require entities that provide registration services, such as registrars, to meet obligations for accuracy of registration data within WHOIS, with verification processes to be conducted ex ante or ex post. According to the text made public by the European Parliament, domain name registries and registrars must collect and maintain accurate and complete data on the registration of domain names, containing the name, e-mail address and telephone number of registrants.

The official text is pending to be published in the Official Journal of the EU before becoming legally binding. Member states will have 21 months to transpose the directive into national law.



# Directive for the resilience of critical stakeholders approved

by Gino Silvatici

Critical stakeholders are entities providing essential services critical to the maintenance of vital society functions, economic activities, public safety and health, and the environment. Therefore, they must be able to prevent, protect themselves from, respond to, resist and recover from hybrid attacks, natural disasters, terrorist threats and public health emergencies.

The directive adopted 22 November by the European Council aims to reduce vulnerabilities and strengthen the resilience of critical stakeholders by improving the delivery of essential services in areas such as energy, transportation, public administration and digital infrastructure.

Member states will have three years - after its entry into force - to adopt a strategy to improve the resilience of critical infrastructures.

Lastly, the directive stipulates that digital infrastructure actors, such as Registries and Registrars, who fall under the scope of NIS 2, are excluded from the scope of this legislation.



# KINDNS: ICANN promotes best practices on DNS security

by Arianna Del Soldato and Adriana Lazzaroni



On 6 September 2022, ICANN (Internet Corporation for Assigned Names and Numbers) launched the "KINDS -Knowledge-sharing and Instantiating Norms for DNS and Naming Security" initiative, tailored for Domain Name System (DNS) operators, with the aim of promoting the sharing of, and voluntary adhesion to a clear set of security rules and best practices, aimed at making the Internet safer, more secure and interoperable.

The DNS, as we know, plays a crucial role in connecting users to services on the Internet, and the protocols regulating its operation, responsible for the instantaneous connection of billions of devices around the world, are open. Similarly, security systems and best practices on DNS, which support the operation of the Internet, are typically open and adopted on a voluntary basis.

A clear example of this is the deployment of the DNSSEC protocol developed by the IETF more than 20 years ago specifically to improve DNS security. However, these features, considered to be the great strength of DNS and the Internet, can also prove to be a great weakness at the same time.

The DNS, in fact, was not designed to be safe, and the challenges to its security are many, if we consider that the key to solving Internet security is being able to coordinate the behaviour of the various systems that are part of it, with collective action and voluntary adhesion to a set of constantly evolving behaviours and technologies. The launch of the website (https://kindns.org) marks the completion of the initial phase of the KINDNS initiative. In its first version, it proposes a basic level of security operations and a relatively small set of agreed-upon practices that the DNS operators of any size can easily implement.

The ICANN community hopes and expects the evolution of the portal to go hand in hand with the evolution of the Internet and the DNS. In the meantime, it invites anyone interested in participating in this initiative and joining KINDNS mailing list at: https://mm.icann.org/mailman/listinfo/kindns-discuss.

It is in this context that ICANN, in line with its mission, and in collaboration with its community, has developed the KINDNS Web portal, which targets both the category of authoritative and recursive DNS operators, to promote its implementation and the maintenance of an equal level of security for all, but also smaller operators struggling to keep up with the latest developments in security measures. KINDNS focuses on three areas of interest:

1. Promoting the adoption of security practices on the DNS through the operator community. This includes maintaining a dynamic information portal that promotes KINDNS practices, helps operators self-assessing their activities on the DNS, and offers guidelines on how to implement them.

2. Requesting and gathering feedback on the guidelines proposed by KINDNS in order to identify and refine potential areas of development and emerging best practices that could be future candidates to be added to the portal.

3. Developing advanced tools, enabling operators to conduct self-assessments, and an observatory on the DNS security indicators that can help measuring and evaluating the impact of KINDNS itself.



# "Universal Acceptance" for a more inclusive and barrier-free Internet

by Arianna Del Soldato and Adriana Lazzaroni

The term "Universal Acceptance" (UA) was coined in 2001 by Ram Mohan, chief operating officer of Afilias Inc. to define the principle that any top-level domain (TLD) should work within all applications regardless of the script, number of characters, language used or how new it is. This principle is becoming increasingly important for the future of the Internet to achieve a more inclusive, barrier-free and accessible Internet for all.

In fact, according to a recent United Nations report, by the end of 2030 the world economy will have to cope with an additional three billion new Internet users, and most of them will use non-Latin characters. ICANN, too, is working with this in mind to build a more inclusive and multilingual Internet, and to ensure that all domain names and e-mail addresses -in any language or script, as well as any new TLD with desinences longer than two or three characters (e.g. 在线, . Photography, .ไทย, .huj) - are accepted equally by all applications, systems, and devices on the Internet. This should apply to all country code (ccTLD), generic (gTLD) and internationalised domain names (NDI or IDN), including IDN ccTLDs.

To this end, ICANN ascertain the level Registries with res with the intention the necessary tec and appropriate p In addition, within Code Names Supp dedicated to the t with the aim of de ICANN will decide upcoming efforts.

> Moreover, ICANN has formulated and sent to "country code" registries a guestionnaire on the topic called the "UA readiness survey", with the aim of collecting feedback from all ccTLDs by 31/01/2023. Based on the feedback gathered, the ccNSO Board will develop a plan that will be presented to the National Registry community at the next ICANN76 meeting from 11-16 March 2023. Meanwhile, some initiatives, at both the national and regional levels, have recently been put in place such as that of APTLD (Asia Pacific Top Level Domain Association), which has developed, in collaboration with ICANN, a White Paper on the "Role of ccTLDs in Achieving Universal Acceptance" with the aim of promoting the important role that ccTLD managers have to play in supporting and promoting "universal acceptance" of domain names and e-mail addresses. Indeed, the Asia Pacific (APAC) region is one of the most linguistically diverse with, within it, large communities using more than 3,000 languages written in local characters, for which universal acceptance is a key to an inclusive, multilingual Internet across the region.



To this end, ICANN recently launched a survey designed to ascertain the level of preparedness and readiness of ccTLD Registries with respect to possible adjustment to UA principles with the intention of providing them with specific training and the necessary technical support to implement reliable systems and appropriate policies for IDNs and UA.

In addition, within the framework of ICANN's ccNSO (Country Code Names Supporting Organisation), two Workshops dedicated to the topic were held in December and January, with the aim of deepening the discussion on the strategy that ICANN will decide to adopt in this regard, and how to organise upcoming efforts.

# International appointments from the digital world

### IETF

**25-31 March 2023** IETF 116, Yokohama, Japan

### RIPE

**22-26 May 2023** RIPE 86, Rotterdam (Holland)

### **CENTR** (for members only)

**15-16 February 2023** 68th CENTR Legal & Regulatory workshop Brussels (Belgium)

**28 February 2023** 25th CENTR Security workshop, online **1-2 March 2023** 37th CENTR Marketing workshop, Florence (Italy)

#### 9 March 2023

69th CENTR GA - 2023 CENTR Annual General Meeting, online

## **ICANN**

### 2 February 2023

Webinair: Understanding and combating DNS Abuse - Encouraging Best Pratice, online

### 11-16 March 2023

ICANN76, Cancùn (Mexico)



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