### Real or Fake?

## Activists take down fake business websites in their fight against Internet fraud

Andreas Zingerle, University of Art and Design, Linz, Austria. Oct. 23rd, 2015, NET ACTIVISM conference, Rome, Italy.

### Andreas Zingerle

- PhD candidate
- Lecturer HCl at university of Art and Design, Linz, Austria.
- Media artist working in the field of Interactive installation and topics of Internet crime and HCI.
- Together with Linda Kronman → <u>kairus.org</u>

### Overview

- Fake websites everywhere!?
- Activist strategies against fake websites
- Art installation "Megacorp."
- Creative media competence training
- Q & A

# Research into vigilante communities and net activist groups who fight against Internet fraud

### Fake websites everywhere?

- 20% of the Web is fake (Gyongyi and Garcia-Molina 2005).
- 70% of ".biz" and
- 35 % of ".us" domain pages are fake (Ntoulas et al. 2006).
- 85% of phishing websites are registered ".cn"

### Reserch motivation

- "Artists against 419" (aa419) activists & database visit the page and see what sort of 'new' companies were added each day.
- After a while you start seeing similar companies reappear again and you start reading the forums.
- Dig deeper into anti-scam activism practices
- Research for an visualisation: No visualization or artwork found that deals with fake websites.

### Research questions

- How do these fake websites look like? Clones of existing websites vs. 'real fake' businesses
- Are there patterns depending on countries or industry branches?
- How are the fake websites detected?
- Why is this done by vigilante communities?
- Do they follow certain ethics or moral strategies?

### Observation of AA419

#### ARTISTS AGAINST 419



#### artists against 419

- o main site
- o blog
- forum
   contact us
- .....

#### fake site database

#### your account

register

#### **Fake Sites Database**

**DISCLAIMER:** artists against 419 ("aa419") identifies fraudulent websites and makes this data available as a public service. We discourage any form of communication with these websites. If you chose to communicate with them you do so at your own risk.

The publicly available whois information listed in the aa419 database was accurate on the date that the website information was entered into the aa419 database. Inclusion in our database does not necessarily indicate criminal activity on the part of the registrant, host or any affiliated companies or individuals.

All data is provided for your personal information only, aa419 and its members shall not be liable for any errors in the database or for any actions taken in reliance thereon.

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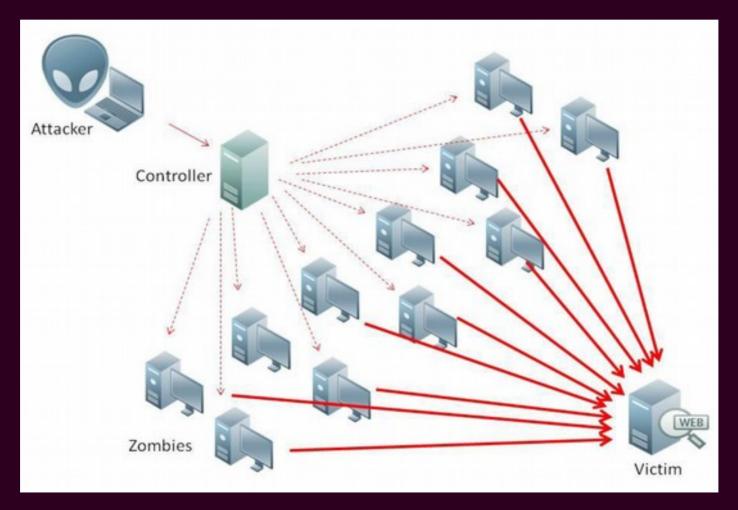
#### 1 2 3 4 5 6 7 8 9 10 11-20 Next

Records 1 to 20 of 104292

	Url_	Site Name		Date Added (down)	Updated
P	http://www.brdexpress.com	Border Express	active	2015-09-30 15:10	2015-09-30 15:10
P	http://www.vehicles-store.com	Vehicles Store	active	2015-09-30 15:09	2015-09-30 15:09
P	http://www.churchhilltrust.com	Churchhill Trust Bank	active	2015-09-30 02:59	2015-09-30 02:59
P	http://www.apclogistic.net	APC Freight Courier	active	2015-09-30 02:32	2015-09-30 02:32
P	http://www.highlandglobaltradingptyltd.com	High Land Global Trading PTY LTD	active	2015-09-30 02:25	2015-09-30 02:25
P	http://www.ut-gh.com	UT Bank Ghana	active	2015-09-30 02:19	2015-09-30 02:19
P	http://www.a-shipping.co.za	Alert Shipping Services	active	2015-09-30 00:20	2015-09-30 00:20
P	http://www.ashippingltd.com	Alert Shipping Services	active	2015-09-29 23:37	2015-09-29 23:37
P	http://www.opalsecurities.com	Opal Securities Ltd	active	2015-09-29 23:17	2015-09-29 23:17
P	http://www.chemworldshipping.com	Chem World Shipping	active	2015-09-29 23:15	2015-09-29 23:15
P	http://www.fidelitybankitd.com	Fidelity Bank	active	2015-09-29 21:31	2015-09-29 21:31
P	http://www.glotrustint.com	GTINT'L	active	2015-09-29 21:20	2015-09-29 21:20
P	http://www.pmkpaperline.com	Paper Mill & Kraft Company	active	2015-09-29 21:08	2015-09-29 21:08
P	http://www.unitedexservice.com	United Express Courier Service	active	2015-09-29 21:05	2015-09-29 21:05

### Old tactics

'Bandwith hogging' and DDos attacks



Self programmed software called "Muguito" and "Lad Vampire", discontinued 2007

### Present tactics

- Collect evidence and information about the fake website that proves that it is a fake business or at least raises certain suspicion
- Write complaint letters to hosting providers
- Maintain good relations to hosting providers and law enforcement.

### Open Source Intelligence Tools

- AA419 members use OSIT to collect evidence:
  - 'Whois' and DNS Entries
  - contact the 'official' website owner
  - crawl the web for copies of the website
  - check if the company is registered in this country
  - visit the physical addresses to see if a company is located there.

### Domain Whois Lookup

- Do a whois lookup to see who owns the domain
- The result will tell you the registrar (company that the domain was purchased through), when it was created, when it expires as well as contact details.
- e.g. able to confirm that the domain was owned by a company in China, not the running shoe company located in the U.S.
- Another key observation to look for is how long the domain has existed. If it has been active for less than a year, then it is most likely a scam website.



DOMAINS V

HOSTING \*

WEBSITES \*

#### andreaszingerle.com registry whois

Domain Name: ANDREASZINGERLE.COM

Registrar: KEY-SYSTEMS GMBH Sponsoring Registrar IANA ID: 269 Whois Server: whois.rrpproxy.net

Referral URL: http://www.key-systems.net

Name Server: DNS0.SERVUS.AT Name Server: DNS1.SERVUS.AT Status: ok http://www.icann.org/epp#OK

Updated Date: 27-jan-2015 Creation Date: 11-jul-2008 Expiration Date: 11-jul-2016

#### andreaszingerle.com registrar whois

Domain Name: andreaszingerle.com

Registry Domain ID: 1507699390\_DOMAIN\_COM-VRSN

Registrar WHOIS Server: whois.rrpproxy.net Registrar URL: http://www.proserver1.at Updated Date: 2015-01-27T19:09:30.0Z Creation Date: 2008-07-11T11:55:23.0Z

Registrar Registration Expiration Date: 2016-07-11T11:55:23.0Z

Registrar: Key-Systems GmbH

Registrar IANA ID: 269

Registrar Abuse Contact Email: abuse@key-systems.net

Registrar Abuse Contact Phone: +49.68949396850 Domain Status: ok http://www.icann.org/epp#ok

Registry Registrant ID:

Registrant Name: Treuhand Account Peter Vratny

Registrant Organization:

Registrant Street: Welser Strasse 91

Registrant City: Pettenbach Registrant State/Province: Registrant Postal Code: 4643

Registrant Country: AT

Registrant Phone: +43.1236605060

Registrant Phone Ext: Registrant Fax:

### Contact information

- Is there a way to get in touch with someone?
- Is the contact email using the TLD or is it a free email service? (gmail, hotmail)
- Is it a valid address? Can I find the address through OSM, Google.maps, etc.
- If there is a phone number provided, is it a valid number? Does the country code fit the address? Can I find the phone number in a phone book? Can I call there during their business hours?

### SSL (Secure Socket Layer)

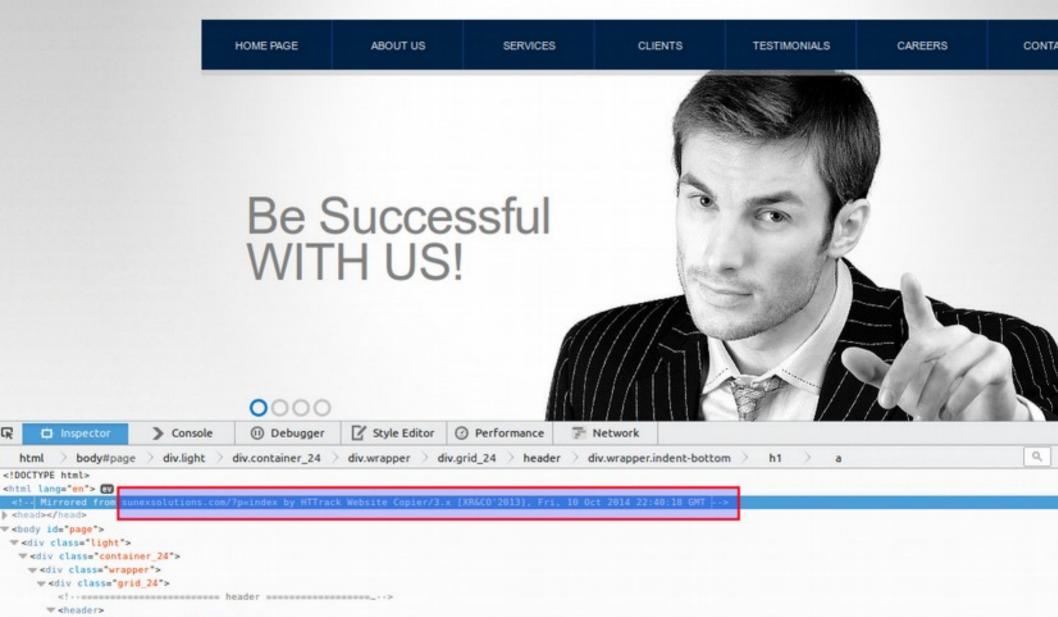
- Many fake or fraudulent sites will not bother to buy an SSL (Secure Sockets Layer) certificate.
- SSL certificates secure the transfer of your data when you submit sensitive information (creating an account, or submitting payment info) and cost money.
- A scam site, quite often, won't bother with an SSL certificate, as the site will likely be shutdown within a couple months after the fraud has been reported.

UniCredit Bank Austria AG (AT) https://online.bankaustria.at/wps/portal/userlogin



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#### **ARTISTS AGAINST 419**



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#### **Fake Sites Database**

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1 Recor	ds 1 to 1 of 1			
-	<u>Url</u>	Site Name	<u>Status</u>	Date Added (down)
P	http://www.sunexsolutions.com	Sunex Solutions	dead	2014-10-10 19:25



A lot of the fake sites are found by searching text from known fakers ... or it is possible to find the source – the original – page that has been faked

### Copyscape

http://www.start-office.biz/

Copyscape Search

Tip: Search for copies of a specific page on your site by entering its URL.

Only top 10 results shown for Start-Office, Inc.. Click a result below to see the matching content.













Do you buy content? Check if it's original before you purchase with Copyscape Premium.

Want Copyscape alerts? Copysentry monitors the web and emails you when new copies are found.

Got a large website? Check up to 10,000 pages in a single click with Premium batch search.

. ...

New! Check www.start-office.biz for internal duplicate content and more with Siteliner.

#### Regus Portland, OR | LinkedIn

... Our products and services allow our customers to concentrate on their core business, and use their talents to best effect. Be they the largest global corporate or an entrepreneur with an idea, we help them be more flexible, more cost-effective and more agile - and better able to face the https://www.linkedin.com/pub/regus-portland-or/104/5b7/410

#### Services: GettheOffice

Our products and services allow our customers to concentrate on their core business, and use their talents to best effect. Be they the largest global corporate or an entrepreneur with an idea, we help them be more flexible, more cost-effective and more agile - and better able to face the http://gettheoffice.com/services.html

#### Our Products & Services - Regus USA

Our products and services allow our customers to concentrate on their core business, and use their talents to best effect. Be they the largest global corporate or an entrepreneur with an idea, we help them be more flexible, more cost-effective and more agile - and better able to face the http://www.regus.com/about-us/our-products-and-services.aspx

#### Start-Office, Inc.

... Welcome! Create a business presence anywhere you want to be - Virtually. Our products and services allow our customers to concentrate on their core business, and use their talents to best effect. http://pinkomote.com/

#### lance portland profiles | LinkedIn

... we help them be more flexible, more cost-effective and more agile - and better able to face the unexpected challenges of business in the 21st century. Offices Office space on https://www.linkedin.com/pub/dir/lance/portland

#### Regus USA Coupon September 2015 | Businessworld from \$59

... Regus help you be more flexible, more cost-effective and more agile - and better able to face the unexpected challenges of business in the 21st century. http://www.promopro.com/merchant-Regus-USA-coupons-deals-17242.html

### File a report

- host is responsible for physically hosting the site / email addresses
- <u>registrar</u> is responsible for the domain name registration
- Look for other possibilities to warn other people and potential victims.



Startseite Über die Watchlist Alle Themen

Downloads

Presse

Suche

Q

#### Internet-Falle melden

#### Was mit Ihrer Meldung geschieht:

Nachdem Ihre Meldung bei uns eingegangen ist, wird sie von unserem Team überprüft und entschieden, ob ein Artikel dazu verfasst wird. Wir bitten um Verständnis, dass die Watchlist Internet keine Beratung oder Weiterverfolgung zu einzelnen Betrugsfällen oder Internet-Fallen anbietet. Für Beratungsanfragen wenden Sie sich bitte an den Internet Ombudsmann bzw. für Betrugsanzeigen direkt an die Polizei.

#### Meldung



#### Informieren Sie uns über aktuelle Fallen im Netz!

Internet-Falle melden

Beratung & Hilfe

Wie mache ich eine Anzeige?

Newsletter abonnieren

#### Tipps und Informationen zu den Themen

Abo-Fallen

55

43

Facebook-Betrug

www.watchlist-internet.at

















THE STATISTICS OF AST DOST

Join the club

#### The Main stuff

Hang around

#### HOME

This is the forum index page

E GENERAL TORICS

It is currently Wed Sep 30, 2015 11:20 am

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E GENERAL TOPICS	III STATISTICS	LASI PUSI
Welcome to ScamWarners Learn about us and introduce yourself	493 Topics 3235 Posts	å by kzleadshine (♦ ⊙ Thu Sep 17, 2015 8:29 am
News and announcements What's new in the world of scams and ScamWarners.	670 Topics 1149 Posts	å by James ⊕  ⊙ Mon Sep 28, 2015 3:37 pm
An Introduction to scams  An overview of the main types of scam we deal with and the basics of how to avoid being a victim of a scam.	22 Topics 33 Posts	å by AlanJones ⊕  O Mon Feb 17, 2014 5:03 pm
Help! Is this a scam? What should I do? - Victim Support  HAVE QUESTIONS? - ASK FOR HELP HERE -  Have you received an email you aren't sure about? Are you currently corresponding with someone you suspect is a scammer? Do you have questions about a	2314 Topics 16068 Posts	å by vonpaso xlura (♦ ② Wed Sep 30, 2015 6:32 am
scam? Post here for answers and advice.		
I've received a warning. Is it real?  If you have received a warning from someone claiming to be a ScamWarner and want to check if it is genuine, please ask here.	76 Topics 235 Posts	å by Bill F (♦ ⊙ Tue Jul 28, 2015 10:59 am

www.scamwarners.com

#### ARTISTS AGAINST 419

1 100% risk free

#### artists against 419

- main site
- o blog
- o forum
- o contact us

#### fake site database

#### your account

o register

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© Exact phrase All words Any word

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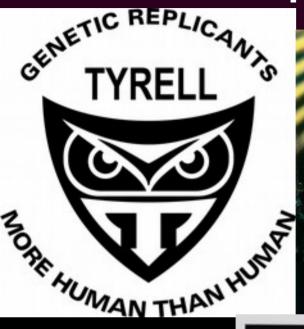
10000				Date Added (down)	
P	http://www.brdexpress.com	Border Express	active	2015-09-30 15:10	2015-09-30 15:10
P	http://www.vehicles-store.com	Vehicles Store	active	2015-09-30 15:09	2015-09-30 15:09
P	http://www.churchhilltrust.com	Churchhill Trust Bank	active	2015-09-30 02:59	2015-09-30 02:59
P	http://www.apclogistic.net	APC Freight Courier	active	2015-09-30 02:32	2015-09-30 02:32
P	http://www.highlandglobaltradingptvltd.com	High Land Global Trading PTY LTD	active	2015-09-30 02:25	2015-09-30 02:25
P	http://www.ut-gh.com	UT Bank Ghana	active	2015-09-30 02:19	2015-09-30 02:19
P	http://www.a-shipping.co.za	Alert Shipping Services	active	2015-09-30 00:20	2015-09-30 00:20
P	http://www.ashippingltd.com	Alert Shipping Services	active	2015-09-29 23:37	2015-09-29 23:37
P	http://www.opalsecurities.com	Opal Securities Ltd	active	2015-09-29 23:17	2015-09-29 23:17
P	http://www.chemworldshipping.com	Chem World Shipping	active	2015-09-29 23:15	2015-09-29 23:15
P	http://www.fidelitybankltd.com	Fidelity Bank	active	2015-09-29 21:31	2015-09-29 21:31
P	http://www.elotrustint.com	GTINT'L	active	2015-09-29 21:20	2015-09-29 21:20
P	http://www.pmkpaperline.com	Paper Mill & Kraft Company	active	2015-09-29 21:08	2015-09-29 21:08
P	http://www.unitedexservice.com	United Express Courier Service	active	2015-09-29 21:05	2015-09-29 21:05

http://db.aa419.org/fakebankslist.php

### Idea how to visualize the website

- William Gibsons naming of big evil corporations that want to take over the world as MEGACORP.'s
- Part of Cyberpunk dystopian sci-fi genre

Fictional examples















### Real life examples



### Real life examples

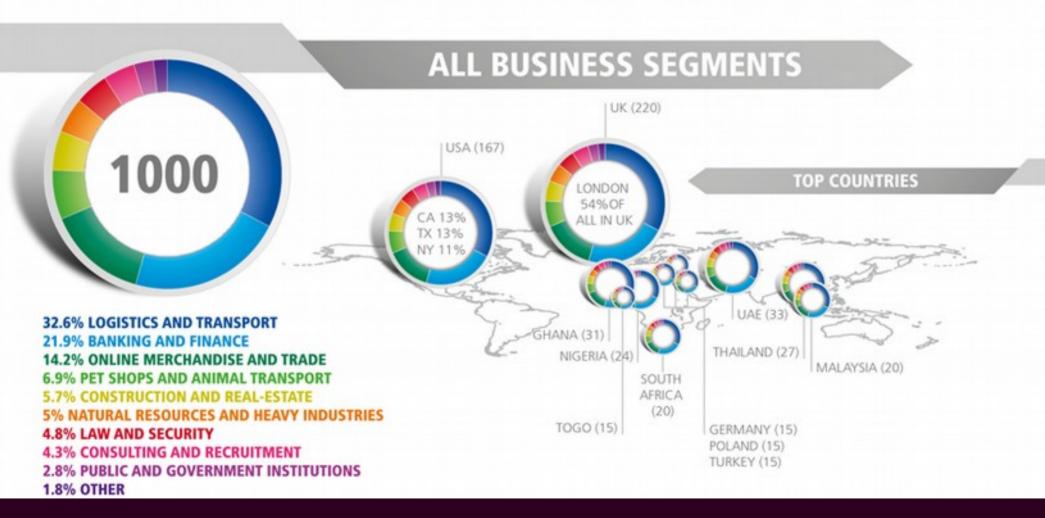


### The Megacorp. conglomerate





# MEGAC#RP.



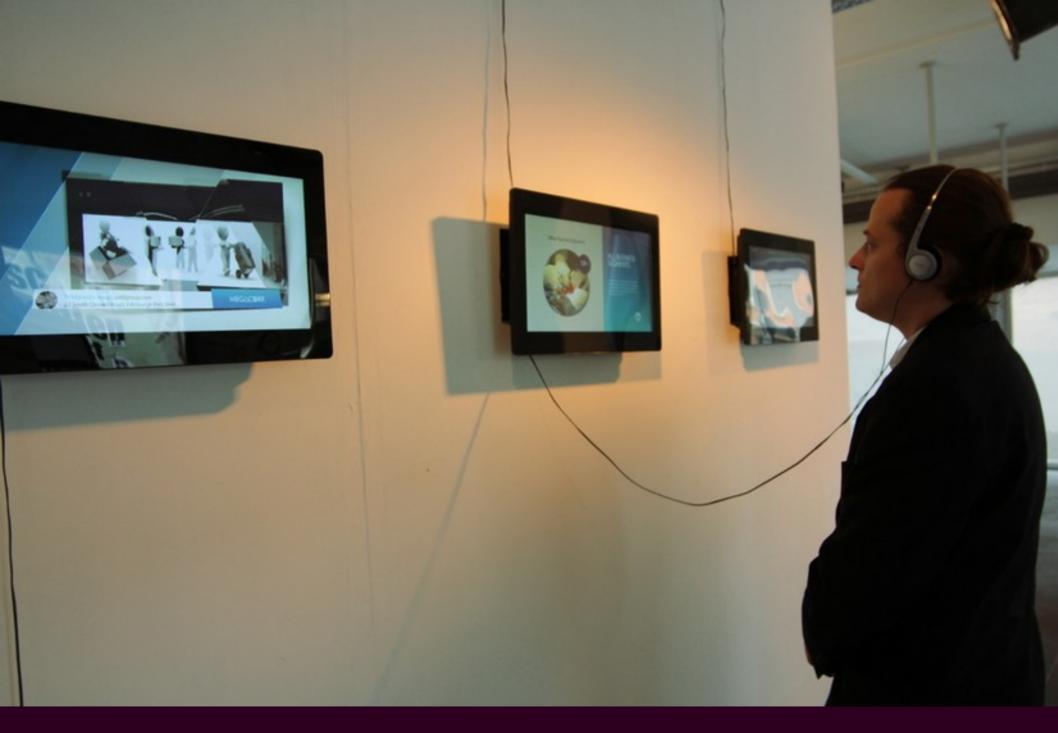


Megacorp.kairus.org





Megacorp.kairus.org



Company showreel / Location check / website

### Conclusions

- Vigilante communities fight against fake websites
- Use open source intelligence tools to collect evidence
- Write complaint letters to hosting providers
- Artwork "Megacorp." visualizes the actions and teaches their strategies in workshops.

# THANK YOU! Questions & remarks?

Megacorp.kairus.org / db.aa419.org

#### Contact:

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<u>Kairus.org</u>