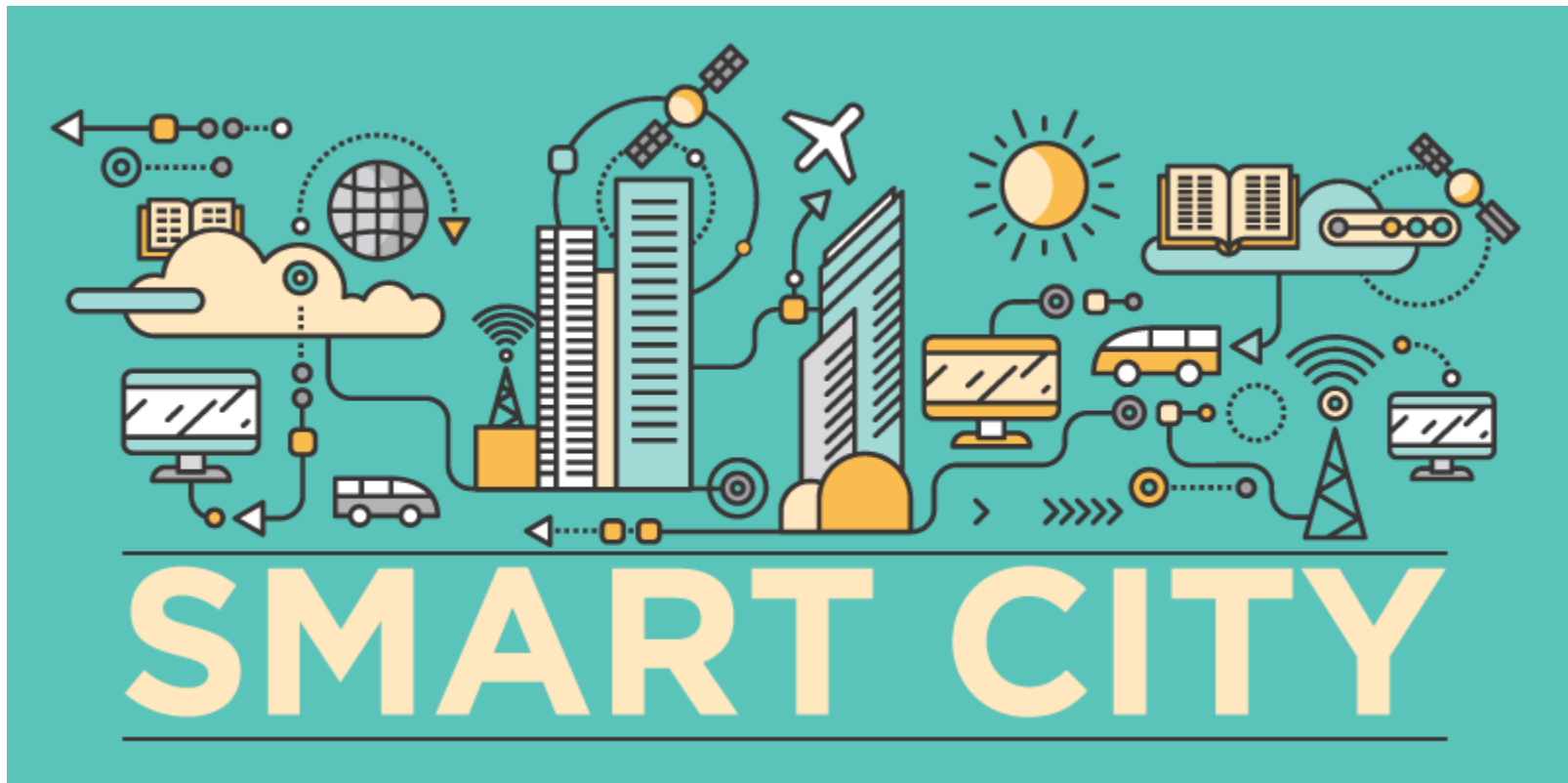


# Challenges for successful Smart city project development

- Intro
- Challenges
  - Technological
  - Social – Economics
  - Security
- Examples of smart city project
  - Prague
  - Berlin
- Companies
- Trends
  - Smart home
  - Bike sharing



- Because of the breadth of technology implemented under the designation of a smart city, it is difficult to determine the definition of this concept. Deakin and Al Wear cite four factors that facilitate the definition of a smart city:
- 1) Applying a wide range of electronic and digital technologies among communities
- 2) Use of information and communication technologies to improve the living and working environment within the region
- 3) Installation of IT systems in government systems
- 4) The localization of the introduction of ICT contributes to innovation and community promotion

- Deakin defines smart city as the one that uses IT technology to meet market demands and that community involvement is a process necessary for a smart city.
- A smart city would therefore be a city that not only possesses ICT technology in particular areas, but also implemented this technology in a way that has a positive impact on the local community.

- Therefore:
- The concept of a smart city connects information and communication technology and various physical devices connected to the network to optimize the efficiency of city services
- Information and communication technology is used to improve the quality of life in cities and reduce costs.



- Internet of Things (IoT) is a system of interconnected computer devices, mechanical and digital machines, objects, animals or people with unique identifiers and the ability to transfer data over a network without the need for interaction between a person and a computer or other people.
- Things, on the IoT, can be any natural or artificial object that can be assigned an IP address and which has the ability to transfer data over the network.



- Internet of Things allows the integration of huge amounts of devices that have built-in sensors that are more or less communicating with each other individually and with various applications.
- There are three kinds of communication:
  - 1) communication of things with people
  - 2) communication among things
  - 3) communications among devices (machine to machine or M2M)

- "Internet of Things" (IoT) is becoming more and more a topic of discussion both at the workplace and beyond. It's a concept that not only has the potential to affect the way we live, but how we work.



## 3 LEVELS

- Technological
- Social-economics
- Security

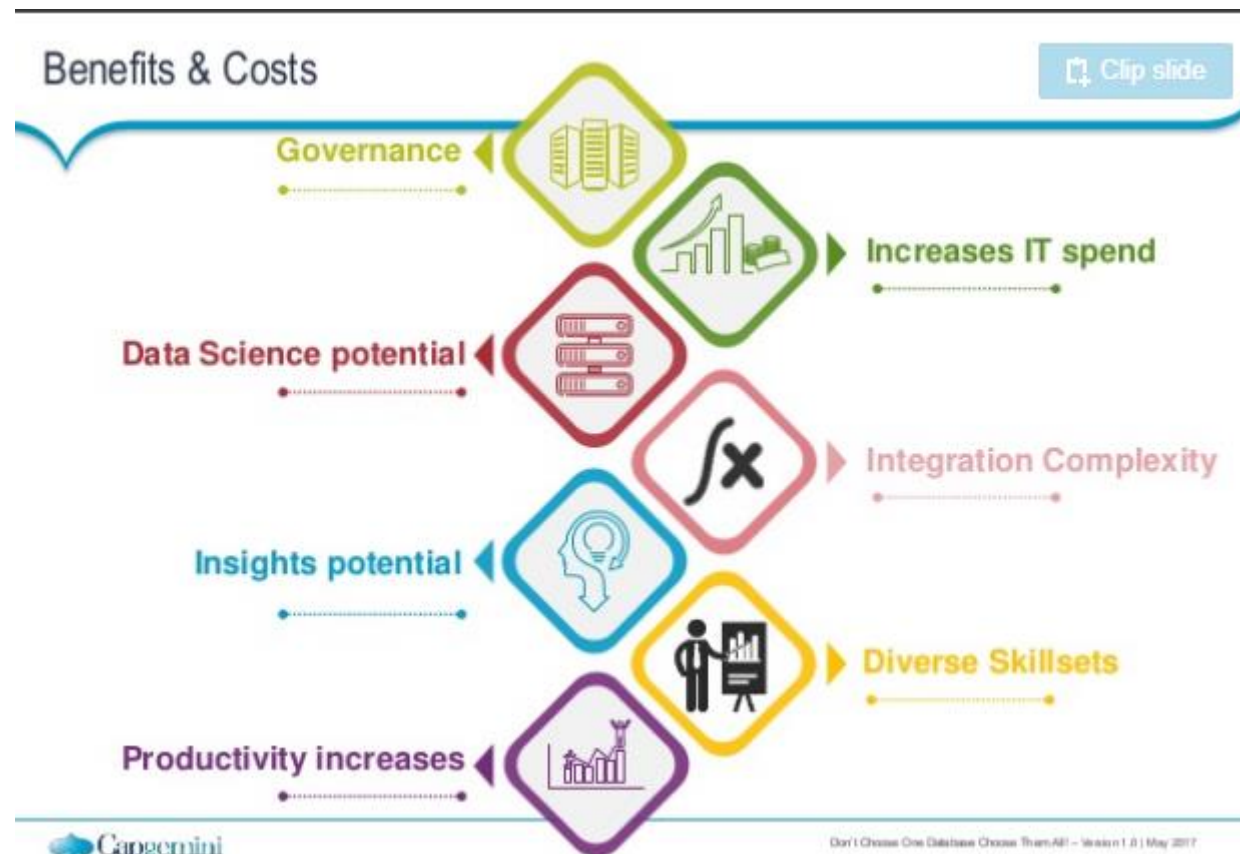
- Database (CRUD functions, Data dictionary, Transaction management, Concurrency control, recovery, authorization, data integrity, administration utilities)
- No time figure attached to the plan

- Sensors  
(over 1 trillion in NY)

- Platforms

- Languages

- Research



# Lidem chodily na mobil jízdenky, které neobjednali. Peníze dostanou zpět

11. prosince 2017 15:55

System, který v Ústí nad Labem posílá na mobily SMS jízdenky na MHD, v sobotu posílal a zaúčtoval i doklady, které si nikdo neobjednal. Některým lidem přišlo na mobil dokonce i několik zpráv a výše stržených peněz se vyšplhala na stovky korun. Odpovědná firma říká, že šlo o technickou chybu a peníze vrátí.



[Komerční sdělení](#)



Medium	Erwartete Lebensdauer (bei 20°C & 50% rF)
Steintafel und Steinmalerei	mehrere tausend Jahre (gesichert)
Bücher/Handschriften (säurefrei)	mehrere hundert Jahre (gesichert)
Bücher/Handschriften (säurehaltig)	70 bis 100 Jahre
Filme auf Zelluloid	mehr als 100 Jahre (gesichert) 400 Jahre (vermutet)
Filme auf PET	Farbe 150 Jahre; S/W 700 Jahre (beides vermutet)
CD (gepresst)	50 bis 80 Jahre (vermutet)
DVD (gepresst)	min. 100 Jahre (vermutet)
CD-R	5 bis 10 Jahre
DVD-RAM	30 Jahre (vermutet)
BD-R	50 Jahre (laut Labortests)
Disketten (ohne Betrieb)	10-30 Jahre
Festplatten	∅ 5 Jahre (mit Betrieb) 10-30 Jahre (ohne Betrieb)
Magnetbänder	min. 30 Jahre
USB-Stick, Flash-Speicher	10-30 Jahre

Quelle: [http://de.wikipedia.org/wiki/Digitales\\_Archiv](http://de.wikipedia.org/wiki/Digitales_Archiv)

**wollmilchsau**



- Financing
- Corruption
- Lack of Center-State Co-ordination
- Availability of Master Plan
- Availability of facilities (Infrastructure, human resources)
- Ecology Ecology (Greenhouse effect, Room for growth, Infrastructure capacity/solidity)
- Acceptance (Dystopia/Utopia, Culture differences )







**Tzv. chytrá lavička s wi-fi a dobíjením v Litoměřicích**



- System security
  - Data sabotage
  - uninterruptible power supply
- Personal information
  - Black market
  - Smart governance
- Spying & controlling

UK

USA



EASTERN EUROPE



I LOVE DIS and it applies to every country ahahaha my grandma had binoculars



**CYBERTHREAT REAL-TIME MAP** EN

MAP STATISTICS DATA SOURCES BUZZ WIDGET

Share

**CROATIA**  
# 91 MOST-ATTACKED COUNTRY

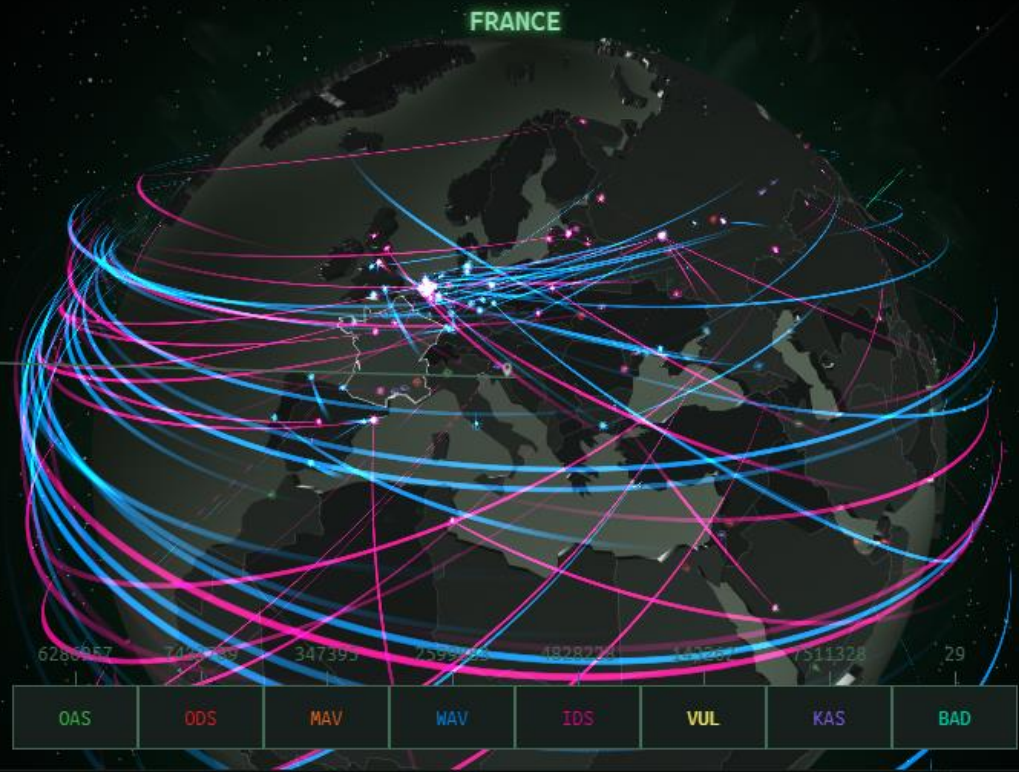
OAS	2591
ODS	2723
MAV	1566
WAV	1198
IDS	4009
VUL	80
KAS	7123
BAD	0

Detections discovered since 08:00 GMT

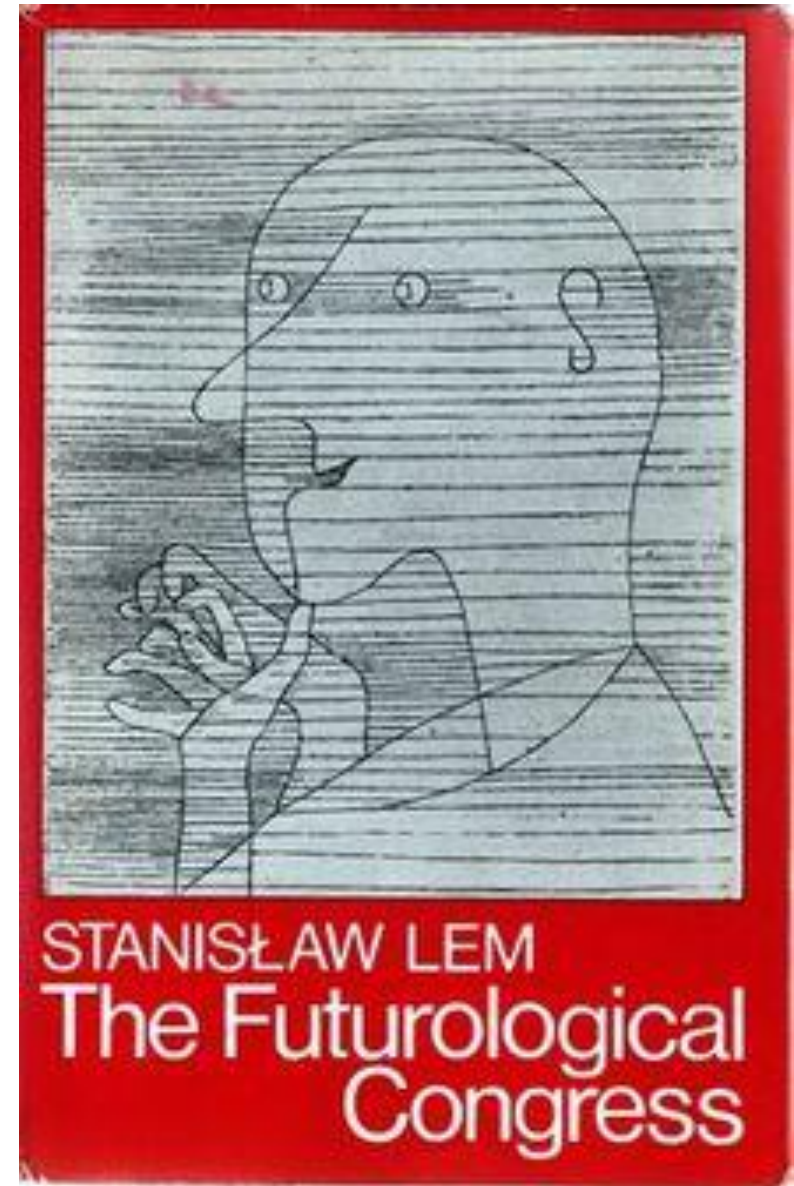
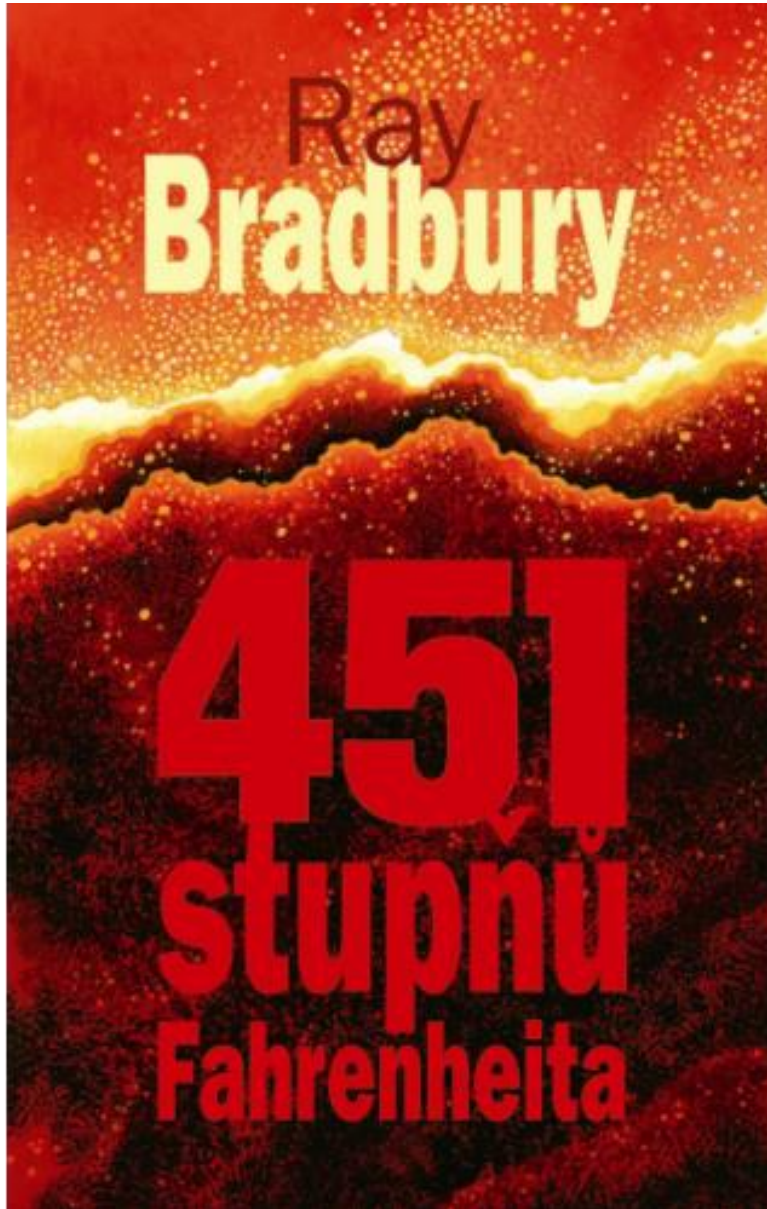
[More details](#)

Share data

f t g+









# Humans Fight Back: San Fran Security Robot Attacked, Knocked Over, Smeared With Feces



by Tyler Durden  
Dec 15, 2017 3:45 AM

594  
SHARES



Earlier today, we mentioned the bizarre story of a San Francisco animal shelter which was using a low cost, high-tech robot security guard to purge homeless people outside its facilities. The San Francisco SPCA branch had contracted Knightscope to provide a K5 robot (the same model which in July committed suicide at a mall fountain) for securing the outdoor spaces of the animal shelter.

Why use a robot to chase away humans? Simple: **money** – it costs the SPCA \$7/hour to rent the robot, about \$3 less than the minimum wage in California, and according to [San Francisco Business Times](#), the robot was deployed as a “way to try dealing with the growing number of needles, car break-ins and crime that seemed to emanate from nearby tent encampments of homeless people.”







## Smart Prague

PRA HA  
PRA GUE  
PRA GA  
PRA G

Mgr. Ondřej Mirovský, M.EM  
Místopředseda Výboru pro Smart Cities ZHMP  
Zástupce starosty MČ Praha 7

- Connekt (Netherlands)
- Include (Croatia)
- HITACHI
- CISCO
- MIT Smart Cities Lab
- Fraunhofer Institute



- built-in central control system that in addition to comfortserves to optimize energy consumption in the home (Vattenfall, Njemačka)



## German Electricity Prices



Source: Epex Spot

- service in which bicycles are available for short-term use for individuals
- Renting bike from point A to point B



- 3 levels (Technological, Social-Economics, Security)
- Citizen not involved, space for corruption and playground only for big players
- Smart city like alcohol: good servant but bad lord!