



45TH ASECAP STUDY & INFORMATION DAYS 2017

The Concession model in the decarbonization era: preparing the infrastructure of the future

Pullman Paris Montparnasse Hotel
29-31 May 2017

www.asecapdays.com



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Session: Financing new mobility needs and trends –
Preparing the infrastructure of the future: What are the solutions?
Paris, 30 May 2017

Will the technological and telecommunication innovations
change the field for Toll Roads?

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Financing: Why PPP'S and Concessions

- ❑ PPP's have developed in part due to financial shortages in the public sector.
- ❑ PPPs make projects affordable.
- ❑ PPP's have demonstrated the ability to harness additional financial resources and operating efficiencies inherent to the private sector .
- ❑ The private sector takes life cycle cost risk.
- ❑ Risks are allocated to the party best able to manage or absorb each particular risk.
- ❑ Provision of budgetary certainty.
- ❑ PPPs “force” the public sector to focus on outputs and benefits from the start.
- ❑ Quality of service is maintained for the life of the PPP Contract or Concession.

The concession model represents the most flexible tool for constructing, maintaining and operating a motorway network, since it can be adapted to different local conditions in terms of regulation, traffic and operational conditions(*).

(*) Evaluation and future of road toll concession, Pricewaterhouse Coopers for ASECAP, November 2014

Greece used Concessions and Tolls to develop and modernize its Road Network



1ST GENERATION CONCESSIONS

- ATTIKI ODOS
- RION ANTIRION BRIDGE (GEFYRA)

2ND GENERATION CONCESSIONS

- MOREAS
- OLYMPIA ODOS
- NEA ODOS
- CENTRAL GREECE (E65)
- AEGEAN MOTORWAY

STATE FUNDED

- EGNATIA ODOS

Technological innovations that lead the way of changing the field



Electric vehicles



Taxi service (Uber)



Connected Vehicles



Automated & Autonomous Vehicles



Shared Cars



Internet of Things

The future is already here!

News > Business > Business News

Half of all new cars in Norway are now electric or hybrid

Norway already has the highest per capita number of all-electric cars in the world

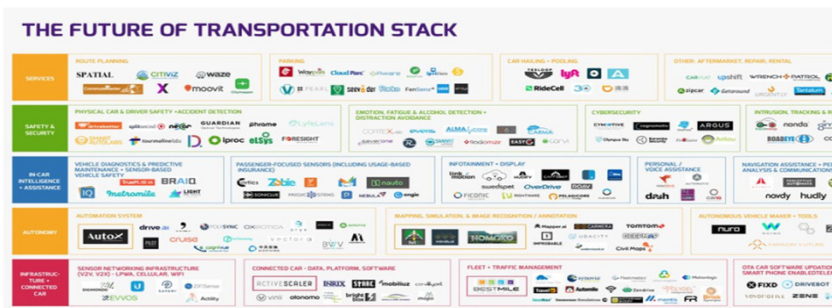
Zlata Rodionova | Tuesday 7 March 2017 10:01 GMT | 19 comments



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MAPPED: THE TOP 263 COMPANIES RACING TOWARD AUTONOMOUS CARS



WORLD'S FIRST EXAMPLE OF MOBILITY AS A SERVICE HANNOVER

World's first example of Mobility as a Service now live in Hannover



Photo: lzf - Fotolia.com

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INFO 22/03/2016

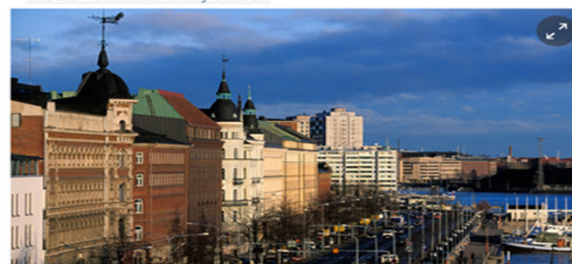
The world's first example of Mobility as a Service (MaaS) is now live in the German city of Hannover.

February 2016 saw the launch of the second phase of üstra's and GVH's (Greater Hanover Transport Association) 'Mobility Shop,' the very first fully operational example of MaaS.

Helsinki's ambitious plan to make car ownership pointless in 10 years

Finland's capital hopes a 'mobility on demand' system that integrates all forms of shared and public transport in a single payment network could essentially render private cars obsolete

Should we ban cars in city centres?



Automotive Industry Trends: IoT



Andrew Meola

Dec. 20, 2016, 12:12 PM 15,279



Companies are pouring money into the Internet of Things, and one area of particular interest to investors is IoT connected cars.

BI Intelligence, Business Insider's premium research service, expects 94 million connected cars to ship in 2021, and for 82% of all cars shipped in that year to be connected. This would represent a compound annual growth rate of 35% from 21 million connected cars in 2016.

Push a button, get a ride: Uber's take on urban mobility

By Eden Estopace (The Philippine Star) | Updated March 13, 2017 - 12:00am



Andrew Macdonald, Uber's regional general manager for Asia-Pacific and Latin America, explains the company's take on the future of urban mobility.

MANILA, Philippines - Uber was hogging global headlines last week and not in a very nice way, but a whiff of fresh air came to town via its regional general manager for Asia-Pacific and Latin America Andrew Macdonald, who was described by Business Insider as one of the "power players" at Uber.

At the game room of Uber's Manila office, the executive who was visiting Manila for the first time talked about getting a taste of EDSA traffic and having lunch at a local fastfood chain.

Many legal issues to be resolved...

Uber won't be forced to stop developing self-driving cars during its lawsuit with Alphabet

In a move that formalizes Anthony Levandowski's recusal, a judge granted Alphabet a partial injunction in its case against Uber.

BY JOHANA BHUIYAN | @JMBOOYAH | MAY 15, 2017, 11:09AM EDT

A judge in Alphabet's case against Uber has determined that the ride-hail company can continue operating its autonomous efforts as is so long as Anthony Levandowski, the executive at the center of the suit, is barred from any and all work related to the radar in question.

This simply formalizes Levandowski's decision to voluntarily recuse himself from all work on lidar — the specific type of radar Alphabet claims he stole the designs for — ahead of the injunction hearing. However, Uber will now face legal ramifications if Levandowski violates this court order.

The court will appoint a "special master" to review and monitor communications and operations to ensure Levandowski is truly removed from all lidar work.

The court order reads:

The bottom line is the evidence indicates that Uber hired Levandowski even though it knew or should have known that he possessed over 14,000 confidential Waymo files likely containing Waymo's intellectual property; that at least some information from those files, if not the files themselves, has seeped into Uber's own LIDAR development efforts.

As part of its bid for an injunction, Alphabet asked that the court order Uber to stop using any and all technology that included allegedly stolen trade secrets in developing its driverless cars. Uber made clear that none of its semi-autonomous cars on the road today use its in-house radars, so regardless of what the judge's decision ended up being, it's not likely the company would have had to stop operating the cars on the road.

The judge also said that Alphabet "overreached" when it asked for protection of 121 of what it believed qualified as trade secrets.

In a statement, Uber said:

"We are pleased with the court's ruling that Uber can continue building and utilizing all of its self-driving technology, including our innovation around LiDAR. We look forward to moving toward trial and continuing to demonstrate that our technology has been built independently from the ground up."



Challenges for Toll Road Operators

New infrastructure (especially IT) requirements?

Traffic and Revenue reduction?

Road safety level improvement?

Platooning, increasing of capacity, reduction of congestion - improvement of the LoS?

Reinvention of logistics?

Mobility as a Service? WHY NOT?



Thank you!

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