

SMART DRIVING CARS



<http://smartdrivingcar.com/5.22-WSTIP-070917>

22nd edition of the 5th year of SmartDrivingCars

Sunday, July 09, 2017



[Active Safety-Collision Warning Pilot in Washington State, IDEA Program Final](#)

Report

J. Lutin, May 19 "The Rosco/Mobileye Shield+ system is a collision avoidance warning system (CAWS) specifically designed for transit buses. This project involved field testing and evaluation of the CAWS in revenue service over a three-month period. The system provides alerts and warnings to the bus driver for the following conditions that could lead to a collision: 1) changing lanes without activating a turn signal (lane departure warning was disabled for this pilot), 2) exceeding posted speed limit, 3) monitoring headway with the vehicle leading the bus, 4) forward vehicle collision warning, and 5) pedestrian or cyclist collision warning in front of, or alongside the bus. Alerts and warnings are displayed to the driver by visual indicators located on the windshield and front pillars. Audible warnings are issued when collisions are imminent. ..."

[Read more](#) *Hmmmm... Very interesting. This is the first substantive report of realities of retrofiring existing transit buses with active safety collision-warning technology. Anyone in the public transit industry should be paying attention to this report. This is the very beginning of actually implementing safety-oriented automated technology in transit buses and it was motivated and led by insurance (Jerry Spears & Al Hatten @ WSTIP + Mike Scudato @ Munich Re). Insurance finally stepping up and leading. Alain*



[Smart Driving Cars PodCast #1: NTSB_TeslaDocket](#)

F. Fishkin, Week of June 25. "NTSB Opens Docket on Tesla Crash..." [Listen here](#) *Hmmmm... Fred, Thank you. Alain*



[The r-evolution of driving: from Connected Vehicles to Coordinated Automated Road Transport \(C-ART\)](#)

A. Raposo, June 2017, "Part I: Framework for a safe & efficient Coordinated Automated Road Transport (C-ART) system. ...

This study suggests exploring C-ART as a new forward-looking approach for traffic flow and system management in the presence of highly automated and connected vehicles. A number of political and legislative aspects are currently being discussed in different international and European fora. These apply to existing legislative frameworks such as the 1968 Vienna Convention on international road traffic, Directive 2009/103/EC on motor insurance, or Directive 2007/46/EC on vehicle approval, among others, that may require modifications. This report analyses the current technological context, policy and legal framework for automated and connected vehicles. Besides, by examining future scenarios, it identifies areas that deserve special attention. This study presents a novel approach, based on a central coordination of fully automated and connected vehicles (i.e. C-ART), that policymakers and different stakeholders may want to consider as a scenario for an eventual full realisation of a safe and efficient mobility system. ...[Read more](#) *Hmmmm... Part of the beauty and elegance of today's dominant forms of mobility (the personal car, bicycles and walking) are their ability to deliver personal freedom of mobility with very little connectivity and coordination. Today's transit alternatives, which are founded on coordination (and a wish for connectivity), suffer horribly because customers are forced to accept what the "coordinated centralized authority" has deemed to provide as a level of service... the bus comes every hour and stops only at these places along this route, take it or leave it! To enslave automated driving technology with connectivity and centralized coordination may well mean that the traveling public will forgo the safety and convenience benefits and stick to driving themselves. Public policy should focus on letting the automation and connectivity focus on the independent individual vehicle and stop worrying about coordinating and orchestrating everybody according to the wishes of some centralized power. It is going to be a very long time before there will be enough automated and connected vehicles out there for there to be any coordination opportunities, so putting that cart forward today is not at all helpful. Focusing on making the automation work (being safer and more comfortable) for individual automated vehicles operating on existing roads with existing drivers is way enough of a challenge that has to be met else this r-evolution never gets off the ground. Alain*



[Volvo Cars to go all electric](#)

Press release, July 5, "Volvo Cars, the premium car maker, has announced that every Volvo it launches from 2019 will have an electric motor, marking the historic end of cars that only have an internal combustion engine (ICE) and placing electrification at the core of its future business.

The announcement represents one of the most significant moves by any car maker to embrace electrification and highlights how over a century after the invention of the internal combustion

engine electrification is paving the way for a new chapter in automotive history...." [Read more](#)
Hmmm... This is another big move by Volvo. Almost 2 years ago, the announcement was that Volvo would accept liability for all at-fault crashes of their cars operating in Self-driving mode. Now this. I hope that Electric Motors sell better than Safety. (If "Safety" sold cars, everyone would have owned a Volvo for the past "40" years.) Alain

AUTOMATED VEHICLES SYMPOSIUM 2017

[Users, Vehicles, Infrastructure](#)

July 10-13, San Francisco. "... Infrastructure..." [Read more](#) *Hmmm... Attend, but I thought the objective was to do this using existing **infrastructure** (and not needing anything except maybe good paint!?!? Anyway, [Breakout 19: SHARK TANK-Change is coming: Who Will Survive](#) Wed July 12, Golden Gate 4, 1:30 -> 5:30. Should be fun. Alain*



[Tesla's First Mass-Market Car, the Model 3, Hits Production This Week](#)

N. Boudette, July 3 "Tesla's long-awaited mass-market electric car will begin rolling off the assembly line this week. But even as it moves ahead, the automaker is encountering challenges to its ambitious plans for growth.

On Monday, it acknowledged that it had experienced a "severe shortfall" in production of 100-kilowatt battery packs that use new technologies and are made on new assembly lines. As a result, Tesla's output of 25,708 cars in the second quarter barely exceeded its first-quarter production, though it was a 40 percent increase from a year ago. Until June, the supply of battery packs was about 40 percent below demand, Tesla said, though supplies improved last month. [Read more](#) *Hmmm... Interesting to watch because of implications on "affordable Self-driving" Alain*



[Waymo Scales Back Claims Against Uber in Driverless Car Dispute](#)

D. Wakabayashi, July 7, "Waymo, the autonomous vehicle business that operates under Google's parent company, dropped several patent claims against Uber on Friday, scaling back some of its major allegations in a bitter lawsuit over driverless technology.

In a federal court filing, Waymo said it was dropping three of its four claims over Uber violating its patents related to light detection and ranging sensor technology, or lidar. Lidar is a vital component in driverless car technology, helping the vehicle detect its surroundings to navigate roads..." [Read more](#) *Hmmm... Remains interesting. Alain*



[You Paid For It: Building a smart city](#)

M. Taylor, July 6, "It's been one year since the city of Columbus won the U.S. Department of Transportation's Smart Cities Challenge. A victory that put some \$50 million dollars in federal

grants into the hands of city leaders. Since then leaders have been putting that money to work in an effort to make Columbus the nation's first Smart City.

In 12 months city leaders have leveraged that first \$50 million into more than \$500 million in investments from private and public sector partnerships. Between grants and local matching, Smart Columbus is well on its way to start turning Columbus into the testing ground for technology-intelligent transportation systems that would soon mean big things for central Ohio from autonomous vehicles to electric cars... " [Read more](#) *Hmmmm... OK, so far so good. Alain*

Bloomberg Technology

[Anarchy on India's Roads Has Driverless Car in a Jam](#)

S. Raj, June 29, "... India's push into the driverless race is being driven by conglomerates such as the Tata Group and Mahindra Group along with a slew of startups and engineering schools, which are taking on global giants in an industry that Intel projects will spur \$7 trillion of spending by 2050. The country, forecast to soon be the world's third-largest auto market, is loath to be left behind even as its chaotic roads and regulations create unique hurdles..." "Indian roads present a true deep learning challenge," said Roshy John, a 17-year veteran in the field of robotics who heads that business at Asia's largest IT services provider Tata Consultancy Services Ltd. ..." [Read more](#) *Hmmmm... Of course they do and focusing on having automation handle these most challenging situations is trying to walk before one can crawl... likely not to be very pretty. Let's focus on learning to crawl really well before we really try to walk. Again, this is an evolution and addressing Kolkata's mobility challenges may not be near the top of the list of today's AV challenges (and forget about connectivity). Alain*

[On the More Technical Side](#)

<http://orfe.princeton.edu/~alaink/SmartDrivingCars/Papers/>

[Half-baked stuff that probably doesn't deserve your time](#)

Bloomberg Technology

[Alphabet Inks Deal for Avis to Manage Self-Driving Car Fleet](#)

M. Bergen, June 26, "Waymo, the self-driving car unit of Alphabet Inc., has reached an agreement for Avis Budget Group Inc. to manage its fleet of autonomous vehicles. It's the first such deal in a field that's still fledgling but exploding with partnerships. Avis shares surged.

The rental car firm will service and store Waymo's Chrysler Pacifica minivans in Phoenix, where the parent of Google is testing a ride-hailing service with volunteer members of the public. Waymo will own the vehicles and pay Avis for its service, an arrangement that is set for multiple years but not exclusive. The companies would not share financial terms..." [Read more](#) *Hmmmm... Unfortunately this is another sign that Waymo is really settling for "Self-driving" rather than staying committed to "Driverless" Seems like such an arrangement is focused on making Self-driving cars available to drivers, rather than offering mobility to those that need to get someplace. Very disappointing. Alain*

Bloomberg Politics

[Safety Advocates Urge Congress to Go Slow on Driverless Cars](#)

R. Beene, June 27, "Automakers should be required to certify the safety of driverless vehicles before they can be tested on roads, and Congress should allow fewer vehicles to be tested on the roads than proposed under Republican-drafted legislation being considered by a House Energy and Commerce panel, according to Advocates for Highway and Auto Safety.

Democrat Frank Pallone, of New Jersey, said lawmakers should not be moving bills out of committee without input from the head of the National Highway Traffic Safety Administration, which is currently vacant awaiting a Trump administration nominee. Lawmakers did not hear from NHTSA at a hearing Tuesday. "This is a big moment for us," Pallone said. "We need to be sure that we get this right and that safety is the first priority. ... [Read more](#) *Hmmmm... Real "Safety Advocates" should be clamoring for more, not less and should be really concerned about un-safe non-automated drivers. Alain*

WIRED

[THE SIDEWAYS ELEVATOR OF THE FUTURE IS HERE, AND IT'S WILD](#)

E. Stinson, July 9, "PEOPLE LAUGHED WHEN ThyssenKrupp, a company synonymous with elevators, announced it was developing one that goes every which way. Who'd ever heard of such a thing? Everyone knows elevators go just two directions: Up and down. Some took to calling it the Wonkavator, after Willy Wonka's wacky lift that goes sideways, slantways, and longways. "There were some doubts," company CEO Patrick Bass says with just a bit of understatement.

Put aside your doubts. After three years of work, the company is testing the Multi in a German tower and finalizing the safety certification..." [Read more](#) *Hmmmm... When I use the elevator analogy for autonomousTaxis, I don't mean this. Whatever!?! Alain*

[C'mon Man!](#) (These folks didn't get/read the memo

Calendar of Upcoming Events:

AUTOMATED VEHICLES
SYMPOSIUM 2017

[July 10 -14, 2017](#)

[Hilton San Francisco Union Square](#)

[Breakout 19: SHARK TANK – Change is Coming: Who Will Survive?](#)

Wednesday, July 12, 1:30 PM – 5:30 PM

AON

[20th Anon Risk Pooling Symposium 2017](#)

July 23 -> 26

Albuquerque, NM

[Step off the Gas – Slam on the Brakes: Automated Vehicle Technology Pros and Cons](#)



2nd Annual Princeton SmartDrivingCar Summit

May 16 & 17, 2018

Princeton University

Princeton, NJ

Save the Date