

Powering up the Supply Chain: implications of an EV World

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ceAUTO

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**Automotive
LOGISTICS**

**CENTRAL &
EASTERN EUROPE**

Who are we?

- Central European Auto Industry Information on-time
- New Car Market Statistics from the region and worldwide
- Supplier Chain Analysis
- Market Research
- B2B Newsletters:
 - CEAuto Headlines
 - CEAuto Headlines Middle East and Africa



CeAUTO
Headlines
Middle East and Africa

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Algeria
Renault Plant Set to Slow Down Production
 As the Oran plant of Renault is about to assemble the last of the SKD kits that the local government allocated for this year, the company is contemplating its options for the last three months of the year. While some media outlets claimed that the plant would be idled in October, Autoalgerie.com claims that production will only be slowed down. The company plans to launch CKD assembly towards the end of the year with the opening of a paint shop.
<https://www.autoalgerie.com/wp/actualite/industrie-automobile/vers-un-ralentissement-de-lactivite-de-renault-algerie-production/>

Egypt
Toyota Tsusho Seeks to Expand Investments in Egypt's Energy, Automobile
 Business Today Egypt conducted an email interview with President and Chief Executive Officer of Toyota Tsusho Mr Ichiro Kashitani. Among other things Kashitani mentioned that „the automobile market in Egypt is the second largest market in Africa, behind South Africa, and we believe it has the potential to become a 300,000-unit market in the near future. We would like to introduce vehicles to the market which meet customer needs while seeking additional sales opportunities. „
<https://www.egypttoday.com/Article/3/75014/Exclusive-Interview-Toyota-Tsusho-seeks-to-expand-investments-in-Egypt>

Morocco
Italian Prma Opens Factory in Kenitra in Record-Breaking Time
 Prma, an Italian group specialising in the design and manufacture of sub-assemblies and metal components for the automotive industry, inaugurated a factory in Kenitra on September 17. Prma invested a total of MAD 320 million in the project. Construction of the factory began in the third quarter of 2018. Extension works are already scheduled and will start at the end of 2020, to meet an increased demand in production from the group in Morocco.
<https://www.moroccoworknews.com/2019/09/282828/prma-kenitra-factory-opens/>

BASF Signs Agreement With Groupe PSA
 BASF has just sealed an exclusive agreement with the PSA Group, intending to provide a set of electroplating coating technologies for all body paint coatings, as well as a specific solution for bumpers.
<http://dailymorocco.com/basf-become-a-supplier-of-psa-morocco/>

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Electric World

0,1 %

95 g/km

0,1 %

- German economy is contracting, some analysts predict imminent recession
- Uncertainty over Brexit
- Various trade wars initiated by the Trump administration
- Climate change
- Shrinking Chinese car market
- “Radical realignment of the industry is underway”

95 g/km

- More stringent emission regulations in the European Union from 2020
- OEMs are forced to switch to electric vehicles and rearrange production plans
- Plant closures, job cuts
- Development of ICE powertrains come to a halt
- Bold production development plans from Volvo, Volkswagen, BMW et. al.

95 g/km

- Sales of electric vehicles do not meet expectations in China
- Tesla is disrupting the industry
- Lack of suitable, reliable battery technology
- Lack of charging infrastructure hinders progress
- Customers still prefer ICEs
- Taxing both electric vehicles and electricity differ in every country

Central European Region Market Overview

Slovakia

- Local OEMs: PSA, Kia, Volkswagen, Jaguar Land Rover
- Production in 2018: 1,080M vehicles
- World leader in number of cars produced per 1000 inhabitants: 198 vehicles

Slovakia

- Kia Slovakia
- Plant location: Zilina, Slovakia
- Capacity: 350,000 vehicles
- Employees: 3800
- Production in 2018: 332,948 units
- Local Models: Ceed, Sportage

Slovakia

- PSA Slovakia
- Plant location: Trnava
- Capacity: 360,000 vehicles
- Employees: 4500
- Production in 2018: 352,007 units
- Local Models: Peugeot 208, e-208, Citroën C3

Peugeot e-208



Produced in Trnava, Slovakia

Slovakia

- Volkswagen Slovakia
- Plant location: Bratislava (vehicles, components), Martin (components)
- Capacity: 360,000 vehicles
- Employees: 14,800 (3000 laid off in Summer, 2019)
- Production in 2018: 408,208 units
- Local Models: Volkswagen Touareg, up!, e-up!, Audi Q7, Audi Q8,
Porsche Cayenne, SEAT Mii, ŠKODA Citigo

Slovakia

- Jaguar Land Rover Slovakia
- Plant location: Nitra
- Opened in October, 2018
- Capacity: 150,000 vehicles (to be doubled)
- Employees: 1500 (to be increased to 2500)
- Production in 2018:
- Local Models: Discovery, Defender (from 4Q 2019)

Volkswagen New Small Family EV



Produced in Bratislava, Slovakia

Czech Republic

- Local OEMs: Škoda, TPCA, Hyundai
- Production in 2018: 1,437,000 units

Czech Republic

- Skoda
- Plant location: Mlada Boleslav, Kvasiny, Turkey (from 2022)
- Capacity: 600,000 (Mlada Boleslav), 300,000 (Kvasiny)
- Employees: Mlada Boleslav: cca 24,000. Kvasiny: cca 9000
- Production in 2018: 886,000 units
- Local Models: Fabia, Octavia, Superb, Scala, Karoq, Kodiaq, Seat Ateca,

Škoda Vision IV



Planned SOP: 2Q 2020

Czech Republic

- TPCA
- Plant location: Kolin
- Capacity: 300,000
- Employees: 2500
- Production in 2018: 210,993 units
- Local Models: Toyota Aygo, Citroën C1, Peugeot 108
- To be taken over by Toyota in 2021

Czech Republic

- Hyundai
- Plant location: Nosovice
- Capacity: 350,000
- Employees: 3300
- Production in 2018: 340,300 units
- Local Models: Hyundai Tucson, i30

Hyundai Kona Electric



SOP: 2020 (Nosovice, Czech Republic)

Hungary

- Local OEMs: Audi, Suzuki, Mercedes, BMW (from 2023)
- Production in 2018: cca 461,000 units

Hungary

- Suzuki
- Plant location: Esztergom
- Capacity: 300,000
- Employees: 3100
- Production in 2018: 171,000
- Local Models: SX4 S-Cross, Vitara
- Set to be come “smart factory”

Hungary

- Audi
- Plant location: Győr
- Capacity: 160,000
- Employees: 13,084
- Production in 2018: 100,000 units and 1,9M engines
- Local Models: Q3, Q3 Sportback, TT

Hungary

- Daimler
- Plant location: Kecskemét
- Capacity: 160,000
- Employees: cca 4700
- Production in 2018: cca 190,000 units
- Local Models: Mercedes-Benz A-Class, CLA, CLA Shooting Brake

BMW



Launch: 2023

Poland

- Volkswagen
- Plant location: Poznań, Wrzesnia
- Capacity: 300,000 units
- Employees: 11,000 (four plants)
- Production in 2018: 266,819 units: Poznań: 190,905, Wrzesnia: 75,904
- Local Models: Poznań: Caddy, Transporter, Wrzesnia: Crafter, MAN TGE

Volkswagen e-Crafter



Produced in Wrzesnia, Poland

Poland

- PSA/Opel
- Plant location: Gliwice
- Capacity: 207,000 units
- Employees: 2890
- Production in 2018: 106,500 units
- Local Models: Astra
- Engine production in Tychy to supply PSA plants new PureTech engine

Romania

- Local OEMs: Dacia, Ford
- Production in 2018: 476,769 units

Romania

- Dacia
- Plant location: Pitesti,
- Capacity: 350,000 units
- Employees: 12,003
- Production in 2018: 335,262 units
- Local Models: Dacia Sandero, Logan, Duster

Romania

- Ford
- Plant location: Craiova
- Capacity: 300,000 units
- Employees: 4200
- Production in 2018: 141,507 units
- Local Models: EcoSport, Puma (from October, 2019)

Slovenia

- Renault
- Plant location: Novo Mesto
- Capacity: 220,000 units
- Employees: 3400
- Production in 2018: 210,307 units
- Local Models: Renault Twingo, Clio V, Smart Forfour

Smart EQ Forfour



Produced in Novo Mesto, Slovenia

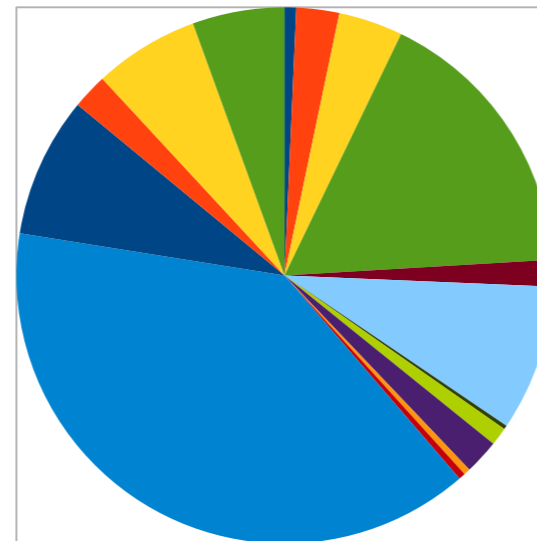
Serbia

- Fiat
- Plant location: Kragujevac
- Capacity: 330,000 units
- Employees: 2280
- Production in 1H 2019: 20,000 units
- Local Models: Fiat 500L

Central European Region New Car Market

New Car Market and EVs

- New Car Sales in 2018 in the Central and East European region (excluding Albania and Montenegro): 1,548,000 units



Central European Region Supplier Developments

OEM Component Plans

- Daimler, Jawor, Poland – battery
- Groupe PSA, Trnava, Slovakia - battery
- Škoda, Mlada Boleslav, Czech Republic - battery

Batteries and Battery Components

- LG Chem, Poland – two battery plants
- Samsung SDI, Hungary – battery and components
- SK Innovation, Hungary - two battery plants (from 2020)
- SK Innovation, Poland – battery components (from 2020)
- GS Yuasa, Hungary – battery
- Umicore, Poland – battery components (from 2020)
- Inobat, Slovakia – battery (from 2020)
- Sangsin, Hungary – battery components (from 2020)

Other Supplier Developments

- Bosch, Hungary
- iBooster electromechanical booster (Miskolc)
- Development of electric steering control unit (Hatvan)
- Lithium mines
- Czech Republic
- Serbia

Local Efforts

- Rimac Automobili, Croatia
- Electromobility Poland
- Car sharing apps
- Spark (Lithuania, Bulgaria, Romania)
- eGo (Romania)
- UberGreen (Romania)
- MOL Limo (Hungary)
- DriveNow (Hungary)
- GreenGo (Hungary, Slovakia)
- Vozilla (Poland)

And as we are in Budapest



Thanks for your attention!

<http://ceauto.co.hu>
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