Ian Henry, AutoAnalysis

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WAF AutoLink

Prospects for UK vehicle production

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Contents

European overview

Production forecast downgraded since start of year – recovery will be slow and staggered

- 2019 production was c19.2m
- **Fell 22% to c15m in 2020**, primarily due to COVID
- January forecast expected 2021 rebound to 16.76m, ie 88% of 2019
- ***May forecast now 15.86m, nearly 1m lower, and <83% of 2019***
- New structural problem of semiconductor supply compounding uncertainty of economic recovery

- Global auto industry was ill-prepared for semiconductor supply chain problems
- Broad lessons from Japanese tsunami and Thai floods not learned
- Reliance on a very small supply base not noticed or ignored
- In consequence:
  - Most Ford plants closed for 1-3 months
  - Renault Spain on half time working through summer
  - Periodic shutdowns or stoppages, and slow line working at most European VMs – Toyota and the Koreans appear least affected in Europe …

European overview (2)

Production situation mirrored in sales

- Although chip shortages explain much of the lost production …
- … production recovery has been limited by delays in new models, eg Qashqai and some PSA launches
- Transfer of BMWs to Mexico, Dacia to Morocco, and other international moves also hamper European production volume recovery
- But EV plans are accelerating (more later on)

- Although Q1 has seen strong sales/registrations increases, *seasonally adjusted annual selling rates* are well below past peaks
- April figures still 23% below 2019 level
- Western Europe may get to 12m – >2m lower than 14.2-14.3m in 2017-19
- France at lowest level for a year
- Spain over 25% lower than 2019

COVID, semi-conductor (chip) shortages and long-distance supply chain fragility …

- **COVID now** largely under control, vaccine roll-out progressing after serious initial problems
- But Indian variant may yet produce a renewed wave and further lockdowns
- Unlike 2020, car plants have remained open, but some countries closed dealerships
- Consumer confidence regarded as fragile and unlikely to be get much better anytime soon

Long distance supply issues

- Texas weather problems and power outages have led to shortages of key chemicals, leading to seat foam shortages in US
- Toyota UK was close to a temporary stoppage; although averted, fragile long distance supply chains highlighted once again
- Has the industry learned the lessons re single sourcing from Japanese tsunami and Thai floods?

Chip shortages

- *Reflects chip sector switching production to tech sector in mid-2020 when automotive orders plummeted*
- *Tech sector demand has continued, making switch back to automotive difficult – hence supply problems*
- *Extraordinary reliance on Taiwan, and especially one company (TSMC), revealed;*
  - *FT reported TSMC had 70% global share of automotive semi-conductors …*
- *Renesas factory fire in Japan compounded issue*
- *Some chip companies have decided to boost their own production in Europe: Bosch and Infineon will do in Europe. More may follow. EU and US government concerned to boost regional resilience in semiconductor supply*

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The UK in 2020 …

- UK car & LCV production fell 28.5% to 972k
- First time <1m for over 10 years
- Production fall largely due to: 6-8 weeks or longer shutdown of vehicle plants in March-May, and beyond in isolated cases
- Falling demand due to COVID, associated economic slowdown

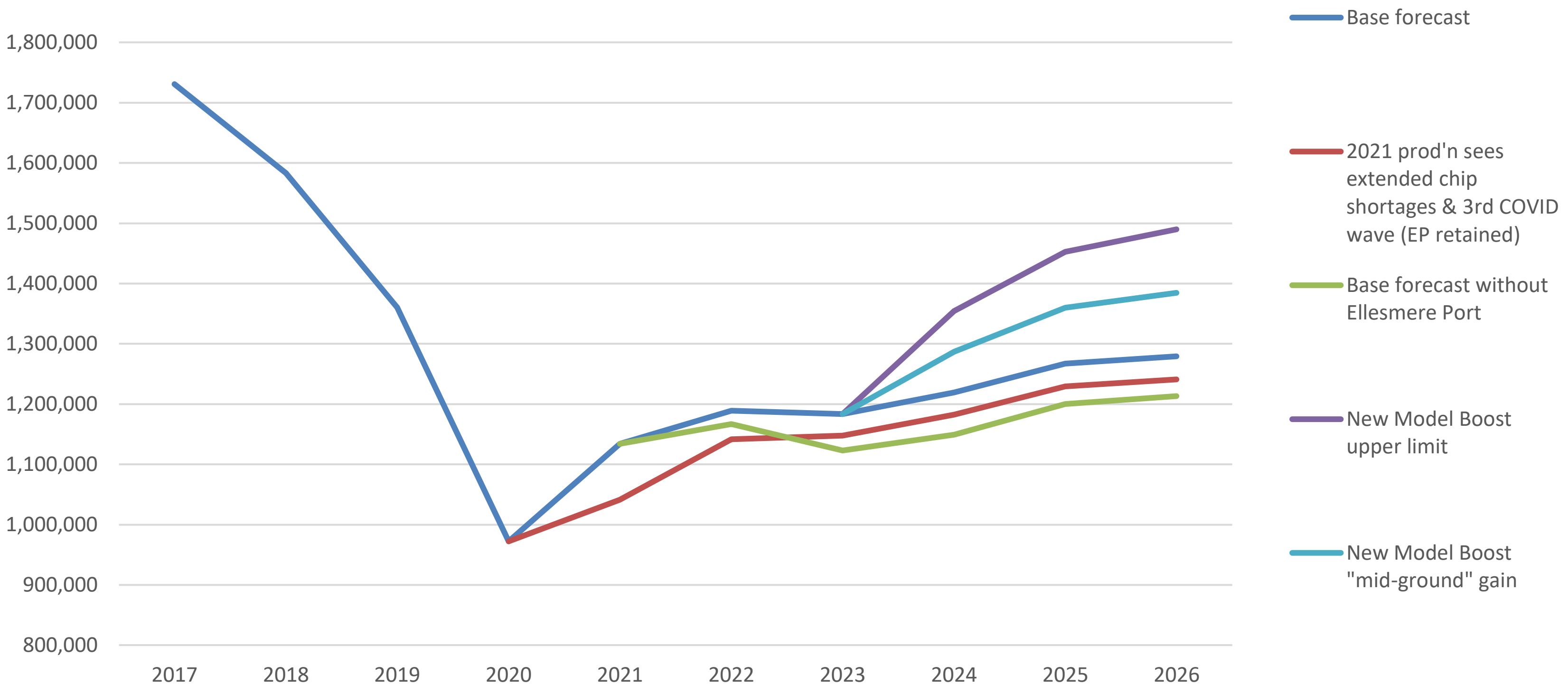
- *Production re-start strong in LCVs especially, but effective capacity reduced across industry by social distancing and COVID compliance*
- *Production disruption in Q4 due to UK/France border issues due to COVID, long distance supply disruption, early signs of production due to chip shortages*
- *UK-EU TCA signed*

The UK in 2021 so far …

- Slow start to UK production, with Jan-Mar down nearly 5.5% @318,000
- Central forecast sees UK production at c1.13 million – recovery of 16.2% - **but still below 2019**
- Continued chip shortage, and slow/staggered post COVID recovery could see output closer to 1m:
  - *F-PACE and Velar production stopped for 1 week in April – Castle Bromwich also stopped – no certainty re return to production*
  - *Juke and Leaf stopped to allow old Qashqais to be completed before new model launched*
  - *Ellesmere Port closed for part of April, uncertainty re future of plant remains*
  - *Honda plant finally closes in July*
- **Some good news …**
  - *3rd shift to be added at Luton van plant*
  - *New Nissan Qashqai production finally started*
  - *All new strategy announced for JLR*

UK production history and forecast to 2026

Dramatic fall in production 2017-2020 – will not be recovered fully



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Explanation of preceding chart

- Base Outlook (**blue**) and COVID problems and chip shortages are limited to 2021, possibly early 2022
- Extended chip shortages and third COVID (**red**) limits and slow recovery but assumed to be broadly overcome
- EP closure (**green**) sees slower pick up and then a dip in 2023 after plant closes
- TCA ratification and normalising of UK-EU relations **might** create a more positive investment climate for UK: new model boost (**purple** and upper **blue** lines) could see production climb back to nearly 1.4 million, or even 1.5 million by mid-2020s
- **There is a long way to go for this to happen, but all is not lost, not yet!**

- *In Base Outlook by 2026:*
  - ***JLR** should be making c375k vs 300k in 2021*
  - ***Nissan** should be making c400k vs 300k in 2021*
  - ***Mini** should be making c230k vs 200k in 2021 – and moving to a full electric line-up*
  - ***Toyota** will be at end of existing model cycle or starting new Corolla cycle*
- *New model boost:*
  - *JLR should be over 400k – depending on model allocation with Slovakia*
  - *Nissan could get back to c460k, with additional Leaf/EVs following*
  - *Toyota should be back to 140k – and EP retained and making c125k or more*

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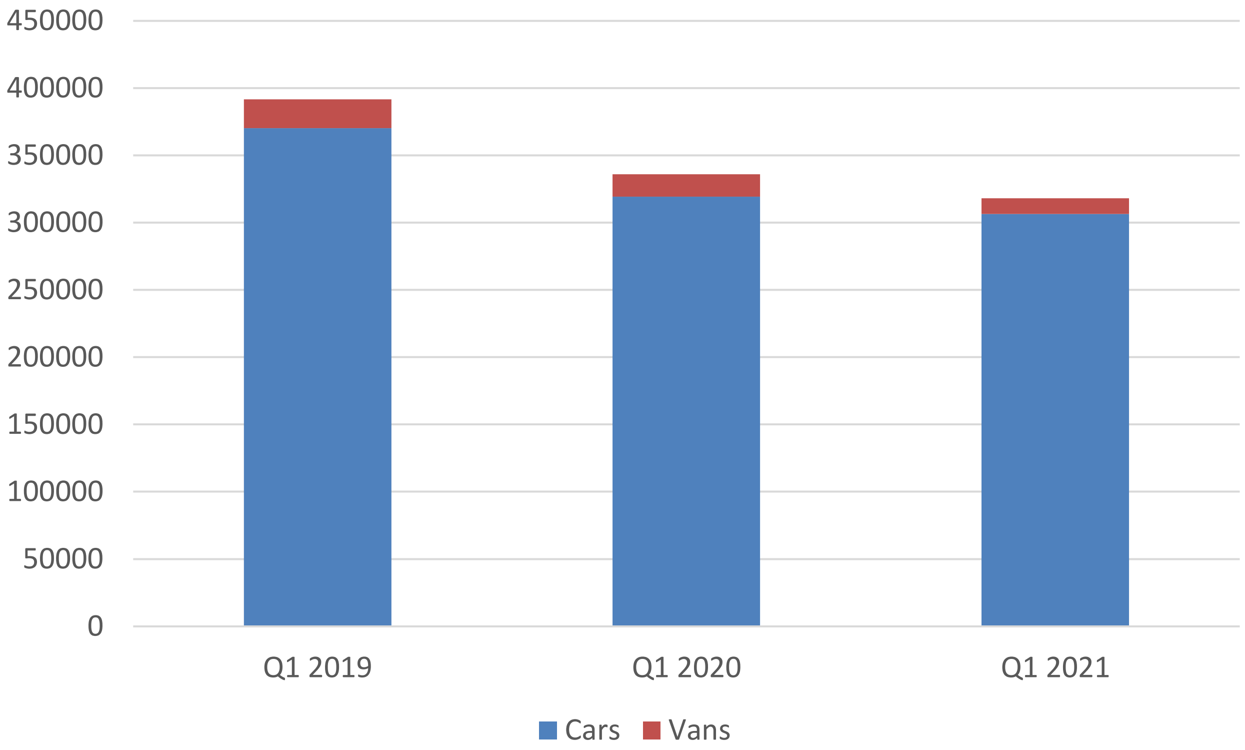
UK Q1 2021 vs 2020 and 2019

Quarterly view shows continuation of recent trends – ie production decline - Q1/21 is 81% of Q1/2019



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Jaguar Land Rover: a better future?

- New **Reimagine** strategy announced in February
- **Jaguar** to go all-electric, new range from 2025:
  - XJe cancelled, significant write-off
  - Current programmes will end by 2025
- New Jaguars based on own platform, to be made in Solihull:
  - New platform could be bought-in, or possibly an evolution of existing I-PACE
  - Castle Bromwich will stop making cars – what will take place there unknown
  - Unlikely to see more than 60,000 Jaguars pa in future – and possibly fewer than this
  - Volume will be limited by price hike and avoidance of Land Rover competition, ie no more SUVs

- *Land Rovers will be built on **two** new platforms:*
  - ***EMA** for Evoque, Discovery Sport and?*
  - ***MLA** for Range Rover, Range Rover Sport and?*
  - *Details of first all-electric Land Rover in 2024 to be confirmed (could be new Velar or electric Evoque)*
  - *Platforms for next Velar, Discovery and Defender also to be confirmed*
  - *Possible that Velar and Discovery will share EMA with Evoque and Discovery Sport*
  - UK volumes will be determined by Slovakian plant allocation
  - Like Jaguar, Land Rover entry price points will all be higher, with **profit not volume the aim from now on**
- *Sourcing of batteries for BEVs to be announced*
- *Probable that some of the largest Range Rovers will be hydrogen powered*

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Other UK VMs … many questions remain unanswered …

Stellantis

- **Will Stellantis retain Ellesmere Port?**
  - Astra stops in April 2022
  - What does UK government need to do retain plant?
  - What could factory make and for which markets?
- **Long term future of Luton van plant?**
  - Stellantis now has four plants – in UK, France, Poland and Italy – capable of making large vans, c550,000 capacity
  - Ford Turkey will have 450,000+ capacity once new investment completed

Other VMs

- *Next **Mini(s)** from 2023, on shared BMW platform:*
  - *Paint shop investment suggests future is secure but production volumes, variants and market allocations are not known – split with BMW Leipzig and Chinese partner to be clarified*
- *When will **Nissan** add more EVs at Sunderland?*
  - *Hybrid Qashqai likely to dominate output well into 2030s … unless emissions rules change again*
- ***Toyota** expected to continue with hybrid Corolla at next model change in 2025/26: **no EVs before 2030s***
- *Possibility of **Bentley** SUV being made in VW Hanover, as part of Project Artemis: does this signal further moves overseas?*
- **Aston Martin:** can it get to 10,000?
- **Lotus:** investment by Geely; to make 2,500?
- **LEVC:** has started van version of taxi but is 20,000 capacity ever going to be used?

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European VMs' EV plans

Despite COVID and economic dislocation, European VMs are expanding EV activity

- **VW** has announced **6** gigafactories
  - ID3 and ID4 in production, with at least four more ID models within 3 years
  - 3 VW and all Audi Germany plants switching to wholly or mainly EVs
  - Licensing MEB platform to Ford
- Like VW, **Stellantis** will have its own gigafactories, 1 in Germany, 1 in France – and probably 1 in Spain …
- PSA offers electric versions on all new models; same technology to be used at Opel and Fiat
- **Renault** converting Douai to full EV production

- **BMW** expanding battery component production, finishing and pack assembly at all plants in Germany
- This follows 400m euros investment in Munich factory for i4
  - Each BMW factory will make minimum 1 EV by 2022 – and probably more …
- **Mercedes**' EQ range – EQA, EQB, EQC, EQE, EQS and EQV nearing completion … supported by in-house battery assembly (EQT to be made by Renault)
- **Volvo** XC40 and C40 full EV ratio expected to be >50% this year, more EVs to follow
- **Tesl**a factory in Berlin SOP 2023

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The UK battery factory conundrum …

- *VMs increasingly regard batteries and cells as core technology: **this is an unmistakeable trend***
- ***Stellantis** and **Volkswagen** have both emphasised need to increase vertical integration and retain control of highest value part of the car*
- ***VMs will reduce dependency on cell producers and external battery pack assembly***
- ***UK still has no definite gigafactory** – Britishvolt may come to fruition, but VMs' in-house battery pack assembly will be common …*
- *Most UK EV battery demand will come from JLR and MINI:*
    - *Nissan and Toyota will make hybrids with Asian batteries*
    - *If EP or Luton make EVs, batteries/cells will almost certainly come from Stellantis in France*
- *Will UK VMs actually want to use a company like Britishvolt or control process themselves?*
    - *As industry moves to more vertical integration in batteries, close co-operation with key VMs becomes more and more important*

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Concluding Remarks …

2020 was a challenging year – and 2021 will just as challenging …

- UK vehicle production **should** get back above 1m – assuming chip shortage is overcome/problems minimised
- FTA with EU should allow UK output to climb back above 1.2m over the long term, but volumes will remain well below past peaks:
    - Do not expect to see recovery anywhere near to past glories of 2017!
    - UK production has fallen permanently – and could fall again … especially as JLR refocuses on profit not volume
- ***And for suppliers the situation is also worrying***
    - ***News in Wales re Tetxron and Toyoda Gosei likely to be replicated across UK***
    - ***Excess supplier capacity and falling volumes in Europe means future investment likely to be in Europe rather than UK … Brexit border issues compound the problem …***
- ***Welsh suppliers of traditional automotive powertrain and chassis components will face a difficult future – need to look to EVs and EV infrastructure for new business …***

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