



Used cars as a lead indicator

- Used car prices are at the heart of the US inflation debate. They accounted for around a third of last week's upside surprise to CPI.
- The chart below shows macro model confidence for auto company <u>Sonic Automotive</u>. Macro had strong explanatory power throughout 2020 & Q1'21, but something changed in April. Model confidence fell sharply &, by the end of the month, SAH was out of regime.
- It isn't quite as aggressive but the profile is the same for <u>CarMax</u>.



- There is an argument that the share price of car companies can be used as a guide for exactly how transitory the current bout of inflation is. Single stock equities as a potential lead indicator for inflation & hence Fed policy.
- The sharp fall in model confidence suggests these stock prices became divorced from macro fundamentals; driven instead by other factors, perhaps the extraordinary shocks caused by lockdowns a year ago & the current economic re-opening.
- It is by no means definitive but, watching Qi's models to see when confidence returns, could be one signal to suggest the current supply/demand imbalances are calming down & fundamentals are re-asserting themselves.
- It is, at least, a real time quantifiable metric worth monitoring. For both individual stock pickers;
 & macro types looking for clues on the inflation debate & the timing of monetary policy normalisation.

DISCLAIMER AND TERMS OF USE:

By using any service/product/content developed by Quant Insight Limited ("QI" or "We") and delivered through the QI website or over email or any other delivery mode on which these Terms and Conditions appear (each, a "Service" or collectively, "Services"), you the recipient of the Service ("You" or the "Recipient" hereafter), agree to be bound by all of the terms in these Terms and Conditions. You may wish to print and keep a copy of these Terms and Conditions. We may change the terms in these Terms and Conditions at any time and such changes will be binding on You if You continue to use a Service after we have notified You (by email, on a Service, or by any other means by which You obtain such notice) that we have changed the terms. Therefore, You should review these Terms and Conditions are personal to You, and You may not delegate Your obligations under them to anyone. If any provision in these Terms and Conditions is invalid or unenforceable under applicable law, the remaining provisions will continue in full force and effect. These Terms and Conditions, Your obligations, and all actions contemplated by these Terms and Conditions shall be governed by the laws of England and Wales, as if these Terms and Conditions were a contract wholly entered into and wholly performed within England and Wales. By using a Service, You represent, warrant and covenant that You (if You are an individual) are at least 18 years of age, can form legally binding contracts, and (if applicable) are the authorized representative of the entity that is agreeing to these Terms and Conditions. For the direct Times of age, and use by such individuals under 18 years of age, and use by such individuals under 18 years of age, and use by such individuals under 18 years of age, and use by such individuals under 18 years of age, and use by such individuals under 18 years of age, and use by such individuals under 18 years of age, and use by such individuals under 18 years of age, and use by such individuals in othe permitted. You agree to keep Y

LIMITATIONS ON USE The content available through each Service is the property of QI and is protected by intellectual property laws. Such content may include, for example, studies, analyses, stories, tools, calculators and other items displayed on the Service. Content received through a Service may be displayed, reformatted, and printed for Your personal, non-commercial use only. You agree not to reproduce, retransmit, distribute, disseminate, sell, publish, broadcast or circulate the content received through a Service to anyone, including but not limited to others in the same company or organization, without the express prior written consent of QI. You may not post any content from any Service to newsgroups, mail lists or electronic bulletin boards without the prior written consent of QI. You may not use any of the data on a Service in connection with the issuance, trading, marketing or promotion of investment products (e.g., derivatives, structured products, investment funds, investment portfolios, etc., where the price, return and/or performance of the investment product is based on or related to our data), nor may You use such data as the basis of a financial instrument, without a separate written agreement with QI and any of our applicable Licensors. Except as may be permitted above, You agree not to copy, modify, reformat, download, store, reproduce, reprocess, transmit or redistribute any data or information found on any Service or use any such data or information in a commercial enterprise without obtaining our prior written consent. Research Use Only The content on each Service is provided for information and research purposes only, as of the date and time provided, and is subject to change without notice. Service content is not intended to be an offer, or the solicitation of any offer, to buy or sell any investment product including but not limited to securities. Service content, including any information regarding the pricing of, or factors affecting, any currencies, securities, indices, financial instruments or any other assets whatsoever, does not constitute any kind of advice, recommendation or solicitation and may not be relied on in relation to any purchase or sale of any security, product or investment of any kind or any investment decision or strategy. QI makes no representation as to the suitability of the Services for any particular purpose. The service content does not take into account the individual circumstances, objectives or needs of any person and does not constitute any kind of representation that any financial instrument is suitable or appropriate for any person. To the extent that the service content contains any opinion as to the pricing of, or factors affecting, any instrument or investment of any kind, it should be noted specifically that such opinion will have been formed on the basis of information made available to QI by third parties, the accuracy of which is outside QI's control, has not been independently verified, and as to which QI accepts no responsibility or liability. Furthermore, any such opinion may already be out-of-date when viewed by the recipient. QI accepts no responsibility to update the information at any time, even in relation to material facts known to QI. In addition, any such opinion will have been formed only on the basis of the consideration of certain factors determined by QI. The opinion may be different if there are material factors that have not been considered. In particular, the performance of any investment may be affected by micro factors related to that investment which are completely unknown to QI and will not have been taken into account in relation to any opinion that may be expressed. Any opinion in the service content will have been formed on the basis of historic macro factors and projections of future performance by reference to historic factors. In practice, past movements and factors may not constitute a reliable indicator of future performance. No Reverse Engineering The systems used by QI to provide a Service are proprietary and confidential, including but not limited to the computer hardware and software the Service runs on. Any system for a Service provided by QI shall not be analysed, decompiled, or reverse engineered, nor should You cause a third party to analyse, decompile, or reverse engineer the same for any purpose.

DISCLAIMER OF LIABILITY AND WARRANTIES QI AND ITS AFFILIATES, AGENTS AND LICENSORS CANNOT AND DO NOT WARRANT THE ACCURACY, COMPLETENESS OR TIMELINESS OF THE CONTENT AVAILABLE THROUGH ANY SERVICE. NEITHER QI NOR ANY OF ITS AFFILIATES, AGENTS OR LICENSORS SHALL BE LIABLE TO THE RECIPIENT OR ANYONE ELSE FOR ANY LOSS OR INJURY CAUSED IN WHOLE OR PART BY USE OF A SERVICE. IN NO EVENT WILL QI, ITS AFFILIATES, AGENTS OR LICENSORS BE LIABLE TO THE RECIPIENT OR ANYONE ELSE FOR ANY DECISION MADE OR ACTION TAKEN BY THE RECIPIENT IN RELIANCE ON SUCH CONTENT OR ANY SERVICE. QI AND ITS AFFILIATES, AGENTS AND LICENSORS SHALL NOT BE LIABLE TO THE RECIPIENT OR ANYONE ELSE FOR DAMAGES OF ANY KIND (INCLUDING, WITHOUT LIMITATION, LOST PROFITS OR DATA, DIRECT, CONSEQUENTIAL, SPECIAL, INCIDENTIAL, INDIRECT, OR ANY OTHER DAMAGES) FROM THE RECIPIENTS USE OF A SERVICE EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGES AND REGRARDLESS OF THE CAUSE OF ACTION. TO THE EXTENT SUCH DISCLAIMER OF DAMAGES IS NOT EFFECTIVE UNDER APPLICABLE LAW, THE ENTIRE AGGREGATE LIABILITY TO THE RECIPIENT OF QI, ITS AFFILIATES, AGENTS OR LICENSORS WILL BE LIMITED TO THE FEES, IF ANY, THE RECIPIENT PAID TO QI FOR ACCESS TO THE SERVICE THAT GAVE RISE TO SUCH LIABILITY. EACH SERVICE AND ALL SERVICE CONTENT IS PROVIDED "AS IS" AND QI AND ITS AFFILIATES, AGENTS AND LICENSORS DISCLAIM ALL EXPRESS AND IMPLIED WARRANTIES WITH RESPECT TO THE SERVICE, INCLUDING BUT NOT LIMITED TO MERCHANTABILITY, FITNESS FOR ANY PARTICULAR PURPOSE AND NON-INFRINGEMENT OF ANY SERVICE CONTENT, AND THAT A SERVICE WILL BE AVAILABLE, FREE FROM ERCORS, VIRUSES OR OTHER HARMFUL COMPONENTS. ANY CONTENT OI AFFILIATES, AGENTS AND LICENSORS PROVIDE IS TO BE USED BY RECIPIENTS IN ACCORDANCE WITH ALL APPLICABLE LAWS, AND THE RECIPIENTS WILL BE SOLELY RESPONSIBLE FOR ANY CONSEQUENCES DERIVED FROM ANY USE OF CONTENT INCLUDING, BUT NOT LIMITED TO, USE THAT RESULTS IN TORT OR CRIMINAL LIABILITY.

The Recipient agrees to indemnify, defend and hold harmless QI, its subsidiaries and affiliates and their respective officers, directors, employees and agents from any claim, cost, expense, judgment or other loss relating to Your use of the Service and, without limitation of the foregoing, any action You take that is in violation of these Terms and Conditions. The failure of QI to exercise or enforce any right or provision of these terms shall not constitute a waiver of such right or provision. Jurisdiction and Applicable Law: Any disputes related to the access and use of the service shall be governed by and interpreted in accordance with the Laws of England and Wales.



Quant Insight Limited 50 Liverpool Street London EC2M 7PR

Tel: +44 20 3865 1940 www.quant-insight.com