<u>Supply chains and interruptions to</u> <u>output</u>

During the prolonged wrangles over Brexit we were beset with false claims that supply chains would be disrupted by moving to a Free Trade or WTO based future arrangement between the UK and the rest of the EU. Some of us pointed out the long and complex supply chains of industries like the car industry already included substantial supplies from non EU sources which worked fine despite coming from outside the single market.

Today we see supply chains badly disrupted in some cases both within the EU single market and from outside it by the impact of government policies followed around the world to deal with the virus. It is curious we do not hear incessantly and regularly from those who used to be worried about these things, now there is something to worry about.

There is first of all the interruptions to supply from abroad in to the UK because the supplier has been instructed by their national government to cease production as part of a plan to impede the spread of the virus. There are then the interruptions to supply that come from a foreign government placing an export ban on essential goods in short supply, as the Germans did on certain supplies needed for virus treatment. This is on top of the US moves to impose tariffs and bans on countries that the President regards as a threat to national security. The USA is seeking to stop allies from buying from some Chinese technology providers, and is imposing strict sanctions on Iran, for example.

Some argue that this means we have now seen peak globalisation. There are various good reasons to encourage more domestic production. It cuts travel miles for products and components. It cuts the risks to supply lines from geopolitical events in various countries. It adds more value in your own country. The economic argument against is that based on the theory of free trade and specialisation. If each place or country specialises in a few things that it becomes very good at and reaps economies of scale in , total world real income should be maximised. That argument works well when most or all governments believe it and promote it, but comes under pressure when countries cheat. Mr Trump's argument with the Chinese is over just that. He thinks they cheat on technology, currency level, state aids and other matters.

The UK is discovering that it cannot rely on China and Germany for some imports at a time of virus crisis. The UK private sector is showing considerable flexibility, with Distilleries offering hand gel, engineering businesses offering ventilators and textile companies running up personal protection clothing. The main constraint on our flexibility seems to be occasional delays in the public sector testing and approving what the new producers can deliver. We need to get better at this flexibility when we cannot always rely on abroad to supply the things we really need. We also need to cut the food miles and make sure our fishing and farming system encourages a higher proportion of home grown and home caught produce.