PAGE 10

BRITAIN'S FOOD SUPPLY

KATE BAILEY SENIOR RESEARCH ASSOCIATE IN THE FOOD PROCESS INNOVATION UNIT, CARDIFF BUSINESS SCHOOL.

Lunchas a Strate

The days when the consumer could command ample supplies of ever-cheaper delicacies from around the world may be over for ever. Food prices are rising dramatically, and probably permanently, hitting the world's leading economies. In developing countries, there have been queues for wheat in Pakistan, a shortage of rice in Bangladesh and Afghanistan has appealed for international help with supplies. Mealtime is about to become an important international issue for everyone.



Signer Issue RITAIN HAS CONSISTENTLY benefited from the international trade in food.

international trade in food. Globalisation has multiplied our sources of supply and helped to develop new

tastes and improved nutrition. But modern food systems have also exposed the country's supply networks as never before to trends and influences that are beyond the control of any one nation.

Significant global changes can already be

detected or anticipated. By 2050 the world's population is projected to exceed nine billion and the desire of the undernourished of today to increase their share of daily calories will continue to assert itself.

Global land capacity is changing, with differing views on the area likely to be available for cultivation and its expansion potential. Many world food production regions are experiencing degrees of water stress, with difficulties and costs compounded by pollution and salination. Climate is expected to have a growing impact on agriculture and food production, the concentration of carbon dioxide in the atmosphere promising changes in rainfall patterns, increased flooding, droughts, fires and more intense storms.

Higher prices of goods and services that support food supply are also having an effect; oil has just hit \$100 a barrel and analysts continue to debate whether we have reached the moment of 'peak oil' or maximum output.

Rising fuel prices have contributed to the higher costs of a taut global shipping capacity, itself already tested by port congestion and the need for longer trade routes as Asian nations in particular venture beyond traditional regional areas. The Baltic Dry Freight Index, a measure of the volume of global trade, passed the ten thousand mark for the first time in October, having been at the four thousand level only a year earlier.

INFINITE CHOICE

Over the last half century, the power of national policy to shape food patterns in Britain and other developed countries has been gradually reduced. In a culture that expects food systems to deliver year-round choice, cheap prices, assured availability and unprecedented quality, the individual consumer is now king.

Regional trading agreements and access to open markets have helped create an expectation of infinite supply. But potentially destabilising challenges are emerging from that same globalised environment. They could start to influence Britain's relations with other countries as well as trade and foreign policies.

COSTLY COMMODITIES

In this uncertain environment, specific factors add to pressure on the land available to produce food. The first is bio-fuels. About one percent of global arable land is now dedicated PAGE 11

to their production, with the United States government notably supporting its bio-fuels industry through significant subsidies. This is a major new source of pressure, pitching growing fuel demand into direct resource competition with the supply of human food and animal feed.

Another key issue is the demand on supplies from the world's major emerging economies. Beyond basic questions of volume, it is increasingly apparent that the wealthier Chinese or Indian consumer is attracted to goods so-far mainly found in the western shopping basket. The annual demand per person for meat in China has risen from twenty kilograms in 1985 to about fifty today. That increases the grain requirement – each kilogram of beef requires about eight kilograms of grain-based animal feed to produce – while adding to the considerable strain on water supplies. Food embodies many times its own weight in water.

This potent mix is propelling 'peacetime' commodity prices to levels usually seen only in a major strategic crisis such as the 1970s oil shock. As recently as November, the United Nations Food and Agriculture Organization reported rising markets in not just a select few, but nearly all, major food and feed commodities. Wheat in particular traded at world record prices, some fifty to eighty percent above 2006 levels. From 2006 to 2007, dairy product price rises ranged between eighty and two hundred percent.

FOOD PRICES OLIVER WALSTON

FARMS AT THRIPLOW FARM IN CAMBRIDGESHIRE

Wheat, Farmer's Woes

WO YEARS AGO I WAS COMPLAINING THAT THE price of our main product, wheat, remained static at around $\pounds 60$ (\$119) per tonne. Last year my frame of mind was a touch more positive: 'this particular farmer is a reasonably happy human being. He still has some wheat

in the grain-store and would be even happier if its price reached $\pounds 100$ (\$197) per tonne.'

Now, a tonne of wheat is worth around $\pounds 155$ (\$306). In October the price actually hit $\pounds 185$ (\$366) – almost three times more than it had been two years ago. So it stands to reason that this farmer today luxuriates in his bubble bath, slurping Krug and humming the Hallelujah Chorus from dawn till dusk. Right? Wrong.

The reason is that this same farmer became so excited when the price of wheat reached $\pounds100$ per tonne that he sold two thirds of his harvest. For a few weeks he was smugger



than any bug in any rug. But then something very strange happened. Suddenly a weird combination of commodity speculators – bored with pork bellies and platinum, Chinese consumers – acquiring a taste for beer and hamburgers, drought-stricken Australian farmers – some of whose harvest failed completely and American maize-growers – who sold their crop for bio-fuel rather than cattle-feed – sent the price of wheat into orbit.

Within six weeks my smugness evaporated. On some occasions towards the end of last year the price actually rose by more than $\pounds 15$ (\$30) per tonne in a single day, which is more than it normally increases in an entire year. I had achieved the improbable – to reverse an agricultural

PAGE 13

Food price inflation is a serious issue in many countries, particularly poorer nations and those such as Japan with a high degree of dependency on food imports. In China, many still remember the 1958-61 famine. With food inflation there currently running at eighteen percent, cost is a high profile public issue. It influenced the government's decision last year to cap the use of grain and oil as energy sources.

Around the world, double-figure food price inflation is becoming a cause of social unrest and a number of governments have imposed limits on domestic price rises. Measures to control inflation are not confined to importing countries. Argentina, Ukraine and Kazakhstan restricted exports of wheat and wheat flour last year, while India banned them altogether. There are suggestions that Russia is considering the establishment of a state-run corporation to increase central control over food supplies.

DRAMATIC CHANGE

What political, economic and social choices will British society need to make in the face of these challenges? With food prices now rising after half a century of steady fall, the debate is moving into relatively new territory. The capacity and role of domestic food production and the reaction of consumers will be key considerations.

The European Union's agricultural policies,



idiom – I had made a sow's ear out of a silk purse.

At 9.1 tonnes per hectare, last year's wheat harvest was neither good nor bad. Once again eight percent of the farm produced absolutely nothing. However, as a result of today's world wheat shortage the wise men of Brussels have decreed that setaside – payments for taking land out of production – will be abolished for next year, and maybe forever.

If you want to buy a tractor today it is probable that you will have to wait at least nine months because every arable farmer in Britain is spending his new wheat bonanza at the local machinery dealer.

PRICE PROMISE

The question that obsesses every farmer in Britain – and indeed the world –is simple. Will the price of all grains – not simply wheat – stay high? Or will it fall back to more 'reasonable' levels? The outcome affects livestock farmers who feed the stuff at least as much as arable farmers who produce it.

It is possible today to sell wheat forward for November for $\pounds 125$ per tonne. But is this sensible? In the good old days when the price moved incrementally, the risk of selling forward was never very great. At worst you might find that you were maybe a tenner a tonne below the market. But today, with the gut-wrenching volatility seen in the past few months,

it is quite possible that any price agreed today could turn out to be fifty pounds too high or too low come the day of delivery.

Since we produce around four thousand tonnes every year this could easily mean that we could 'lose' – or fail to maximise our income by – $\pounds 200,000$ (\$395,165) or more. This is a very frightening scenario, and one that not a single farmer has ever experienced.

PESSIMISTS

The pessimists, who feel the price can only fall, point to the vast increase in the area of wheat planted around the world. The abolition of set-aside in the European Union (EU) will by itself mean a huge increase in its crop. The Australian drought may finally end, which would massively boost the crop there. The Chinese leviathan may well run out of puff, and with it the demand for wheat and barley. However, having spent three weeks there towards the end of last year, I was amazed and rather frightened by its visibly exploding economy.

The optimists take a fundamentally different view. They accept that possible Australian rain and definitely no EU setaside will increase production. But they feel this additional output will easily be absorbed by an unquenchable demand. To support their position they point out that world wheat stocks are at an historic low.

They see the economies of China, India and South East Asia continuing to grow exponentially. They accept that even though the American demand for bio-fuels probably makes no economic sense whatsoever, it appears to make political sense since it marginally reduces the west's dependence on oil producers. Thus maize from Iowa will continue to end up inside Buicks rather than bullocks.

All of which would make an interesting seminar at the Department of Economics down the road in Cambridge but it leaves this peasant farmer feeling profoundly confused. Confused, but not unhappy.

put in place decades ago and which led to foodmountains, have already been changed. This has added to uncertainty about the shape of the market that will supply wheat and the acceptability of some of the supply options.

Since the opening up of the dairy market to increased competition in 1994, that industry too has experienced dramatic changes. Milk Development Council figures show the most recent annual fall in the number of producers in England and Wales at 5.6 percent, with the processor base considerably rationalised. Britain is self-sufficient in liquid milk but the market for dairy products, relying as it does on imports, is increasingly exposed to global effects; skimmed milk powder prices have risen by one hundred and forty percent since 2006.

On one level there will be significant opportunities. The challenge will come in deciding how best to exploit them, not least in the face of inflationary pressures on global feed prices, stiffer environmental regulation and the transition to a low carbon/greenhouse gas economy.

Britain faces many uncertainties and some difficult choices in the possible move away from infinite food supply. A range of particularly significant issues emerged from a Chatham House review of opinion around the supply network, from seed suppliers to industry analysts, conducted between March and November last year:

• The recent rise in global food commodity prices. In the case of wheat, this is widely judged to be more than a short-term blip. Given market forces, and new costs associated with a more sustainable production cycle, the majority of those interviewed believed that changes in existing demand/supply arrangements will be necessary.

• Competing demands on land and the oil, water and skills needed to farm it. The requirements for both food and bio-fuel were identified as creating tough moral choices: 'are we prepared to use food production to meet energy demands?'

• A different approach to genetically modified material in the European Union. Across the wheat and dairy industries, a view appears to be gaining ground that geneticallymodified commodities and products will inevitably be accepted into mainstream food production and processing.

• The future structure of Britain's food supply. Survey contributors offered a number of possible models, each reflecting their own tensions: the strategic framework – globalised supply versus local food sources; the nature of the systems operated – greater industrialisation versus community-based agricultural production; and the means of delivery – corporations versus individual, smaller-scale enterprises.

• Existing supply network relationships. A significant number of respondents believed that food producers might gain more power.

• A shift in societal values towards food. Interviewees believed that attitudes towards food consumption needed to change in light of emerging demand and supply pressures. The extent of the change and how responsibility for it might be split between government, commercial interests and broader society, would be key questions.

• The evolution of a new demand/supply dynamic. The majority of those interviewed believed that a way would have to be found to reconcile market-based demand and supply with increasingly important policy objectives, sustainability and health among them.

The dominant conventional view is that, as a rich society, Britain will always be able to buy the food it needs on world markets. But much

will depend on the reaction of our competitors and trading partners to the emerging challenges. Could we identify new sources of supply if it became necessary? What would be the geo-political implications, particularly if faced by competitors who have already made food supply a strategic requirement and who may follow a foreign policy free of values regarded as essential for the west's trade and development stance?

A fundamental change in the production and consumption of the last half-century may be in prospect. Food supply is once again on track to become a focus of international, and national, debate – and an issue of increasing political significance.

CHATHAM HOUSE WORK ON FOOD SUPPLY

UK Food Supply in the 21st Century: the New Dynamic is a major Chatham House project exploring the issues in this article. Convening influential opinion from around the supply networks, it is evaluating the combined effects of a range of global conditions and influences, focusing initially on the supply of wheat and milk. A paper Britain's Food Supply: Storm Clouds on the Horizon is available on the website www.chathamhouse.org.uk/ research/global_trends/. For more information contact sambler-edwards@chatham house.org.uk