EUROPE-ASIA STUDIES, Vol. 48, No. 4, 1996, 615–628

Mongolia: Agrarian Crisis in the Transition to a Market Economy

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THE RELATIVELY SHORT TIME SPAN before Mongolia resumed positive economic growth in its transition to a market economy has been attributed to a successful and rapidly implemented privatisation and market liberalisation programme. Since 1990, when the transition to a market economy began in Mongolia, a great number of economic and political reforms have indeed been undertaken. Compared with most of the former Soviet Central Asian republics, which gained independence in 1991, Mongolia advanced rapidly in the process to transform its command economy, with policies of deregulation, privatisation and market liberalisation, while simultaneously introducing political democratisation (see Spoor, 1993 and 1995). However, after the first turmoil of economic and political reforms and the dramatic changes in its external environment, by 1992 the Mongolian economy was in a serious crisis, with urgent problems such as a near shut-down of the crucial energy sector (Lee, 1993).[1] Although the annual decrease in gross domestic production (GDP) slowed down in 1993 to 1.3%, over the period 1990–93 GDP contracted in total by 25.2% (see Table 1).

More comprehensive policy reforms were introduced from 1993 onwards, in particular in banking and government finance, although a substantial—state dominated—'soft budget' sector still remained (which caused pressure on the government to keep on providing cheap credit).[2] By 1994 the Mongolian economy's macro-stability substantially improved, with a more manageable level of 66.3% inflation, while a positive growth rate of GDP of 2.1% was reported (MRI, 1995). Was this indeed the simple consequence of a blueprint reform programme which apparently worked in Mongolia and not in other FSU countries? In order to be able to qualify this mainstream—and rather superficial—conclusion, this article will highlight three factors that throw more light on the specific circumstances and complexity of the transition in Mongolia. Firstly, the dramatic import reduction that occurred had a far-reaching impact on the economy. The Soviet aid that financed most of the turn-key projects and essential imports during the 1980s (at the level of 25–30% of GDP) was actually stopped in 1990–91 (Lee, 1993, p. 624). This import squeeze rapidly reduced (and finally removed) the large trade deficit, but induced dramatic negative multiplier effects on industry and capital-intensive—and import dependent—agriculture. Secondly, while the Mongolian economy suffered from galloping inflation during the 1990–93 period, the government rather quickly reduced its budget deficit (and share of government expenditure in GDP) by severely cutting current budget expenditure and improving tax collection. However, the still sizeable deficit that is

0966-8136/96/040615-14

TABLE 1

MACRO-ECONOMIC INDICATORS OF MONGOLIA, 1989–1994

	1989	*1990*	*1991*	*1992*	*1993*	*1994*
Growth of GDP (% p/a)	4.2	− 2.1	− 16.2	− 7.6	− 1.3	2.1[a]
Agriculture	13.8	− 0.8	− 6.9	− 5.9	− 2.5	n.a[b]
Industry	11.4	0.7	− 12.3	− 15.9	− 4.7	3.7[c]
Exports (mln US$)	796	445	347	356	360	324[d]
Imports (mln US$)	1 912	1 024	501	400	361	222[d]
Inflation (% per annum)	–	–	154.3	321.1	183.0	66.3

Sources: State Statistical Office; World Bank (1992, 1994); UNDP (1995).

Notes:
[a]The large differences in Table 1 between the growth rates of GDP and the sectoral contributions of agriculture and industry indicate that by 1989 the service sector had a much smaller (but still positive) growth, while it contracted violently during the following two years. However, this sector then recovered rather quickly, with positive growth in 1993 (0.9%).
[b]No exact figure is known. UNDP (1995, p. 5) notes that extensive livestock is reviving; however, severe crisis is reported in intensive livestock and the large-scale crop sector.
[c]Copper as well as gold output increased. However, the important coal sector declined in 1994 by an estimated 11.6%.[d]These data might underestimate trade turnover, as private external trade transactions are often not recorded by the customs authorities.

caused by capital expenditure (17.0% of GDP, World Bank, 1994, p. 7) is financed by large donor aid. Thirdly, privatisation in the Mongolian economy in general and in the agricultural sector in particular—widely seen as very successfully implemented—has in some cases contributed to higher efficiency of producers, although the changes are sometimes more nominal than real, but caused the break-down of traditional safety networks and the linkages between producers and the downstream or upstream industrial and trade sectors.

The position put forward in this article is that the supposed relationship between widespread privatisation, market liberalisation and economic recovery is a complex and not at all straightforward one. This will be shown through an analysis of the economic reforms in the most important sector of the Mongolian economy, agriculture and the closely linked agro-industry. The large traditional livestock sector, which was a 'buffer' for the economy, seems to be recovering slowly and is contributing with increased bulk exports of skins and hides. However, it presents structural problems of low productivity, labour shortages and inefficient marketing structures. Furthermore, the capital-intensive livestock and crop production sectors suffered enormously during the economic reforms, leading to their near-collapse (UNDP, 1995). The liberalisation of input prices, in particular, left these sectors, which had previously survived on subsidies and cheaply imported inputs, in a largely uncompetitive position. Cereals and potatoes, before produced by large-scale state farms and currently by their successors, the shareholding companies, show an enormous output and yield decline in recent years. Only some of that production loss—such as vegetables for urban areas—is being made up by the newly emerging small-scale private farming sector.[3] The break-up of the previously dominant 'state order system' and the parastatal agricultural support services made it difficult for the now privately operating herdsmen and crop farms to integrate into the still poorly functioning rural markets.[4] Increasing exports of sheep and horse skins and cashmere wool indicate some supply response by producers, although it has been reported that only a small part of final export proceeds goes to them (ADB, 1994, p. 51). What is more important is that total production and export volume of processed agricultural commodities, such as leather products, cashmere textiles, sheepskin coats and camel hair sweaters or carpets, the typical Mongolian exports, are both still decreasing because of a severe crisis in the agro-processing industry.

The heavy dependence of the Mongolian economy on mining exports (copper, molybdenum and tin) is therefore still continuing, and the positive supply response of the livestock sector in exports is expressed in bulk, unprocessed and mostly low-priced traditional agricultural commodities. It is questionable whether long-term economic growth can be based on this development. For sustainable growth to be possible, new rural marketing systems have to be promoted and developed, to avoid private—still largely nomadic—livestock farmers retreating into self-sufficiency strategies, a phenomenon that can already be observed (UNDP, 1994a; ADB, 1994). Parallel to the development of new marketing systems, equal emphasis should be given to the recovery of agro-industry, which is currently in a deep crisis.

Mongolia: economic growth in a Soviet-type economy

Before discussing the economic reforms in Mongolia during the post-1990 period in more detail, some basic data are presented in order to provide a basis for comparison with other transitions, as well as to explain the particular features of Mongolia. Mongolia is a land-locked country of 1.6 million square kilometres in size, with the 'big brothers' China and the Russian Federation as its only neighbours. Although the country regained independence in 1921, since the 1940s it was greatly influenced by the Soviet Union, while being a member of the Soviet trade bloc, the Council for Mutual Economic Assistance (CMEA) since the early 1960s. In recent years relations with China have improved, but for several decades Mongolia was indeed within the Soviet orbit in geo-political terms, in which traditional hostility to its Chinese neighbours was immersed in the Sino-Soviet conflict. Mongolia is a sparsely populated country with not more than 2.3 million inhabitants (in 1993). An estimated 57% live in the few urban centres the country has, the capital Ulaanbaatar and the northern industrial centres of Erdenet and Darkhan. Of the remaining 43% rural dwellers, most are nomadic livestock producers, herding sheep, goats, cows, horses, camels and yaks, living in moveable tents, the traditional *gers*, or based in small rural communities.

The Mongolian economy, under the Tsedenbal regime, grew rapidly during the 1960s and 1970s. Even during the 1980s (in spite of the emerging crisis within the CMEA) sustained positive growth continued with 7% in 1981–86 and 4.6% in 1987–89 (World Bank, 1992, p. 4).

The economic structure of Mongolia's agricultural sector consisted of a traditional livestock sector and a 'modern' capital-intensive industrial sector and crop agriculture. The nomadic herdsmen who have practised extensive animal husbandry for centuries are of great importance both for domestic consumption (meat, dairy products) and for exports of leather, sheepskin, cashmere, wool and related processed commodities. Extensive pastoral livestock production accounted for 73% of gross agricultural output in 1990, while nearly 100% of agricultural exports originated there

(ADB, 1994, pp. 35–37). Nevertheless, the sector was characterised by very low productivity, poor disease control and high annual death rates (TACIS, 1994, p. 13). In spite of the rather extreme climatological conditions (hot summers, extremely cold winters and very limited rainfall), Mongolia has a comparative advantage in this field, but decades of deliberate government policy to influence the terms of trade in favour of the 'modern' sectors and to the detriment of the herdsmen led to underdevelopment of this crucial productive sector of the economy.

The modern state sector was formed by the capital-intensive breeding and fodder-producing farms, and modern agricultural farms that made intensive use of chemical inputs in crop cultivation. Through implicit fiscal extraction, substantial resources were transferred from the traditional to the modern sector, confirming the dualistic nature of the Mongolian economy (World Bank, 1992, p. 57). Finally, since the introduction of a Soviet-type command economy, and with its integration into the CMEA, an industrial sector emerged, based on rich natural resources such as copper, molybdenum and coal.[5] While in the early decades of this century Mongolian was still a backward agricultural country, basically depending on the self-sustained pastoral livestock economy, the process of industrialisation dramatically reshaped the economy, with mining and industry being the motor of economic growth. This was accompanied by impressive human resource development, national research and higher education facilities (ADB, 1994; World Bank, 1994).

From Mongolian perestroika *to a market economy*

Economic and political reforms have advanced further than in most of the former Soviet Central Asian republics (with the possible exception of Kyrgyzstan), which can be compared with Mongolia in many respects. Some reforms were already implemented in the second half of the 1980s, under the Mongolian variant of *perestroika*. However, more extensive reforms were initiated in early 1990, when popular demonstrations led to the first multi-party elections in Mongolia. Although only gradual changes took place in political power, a new democratic constitution was approved. The government is still dominated by the previously ruling party (Mongolian People's Revolutionary Party, MPRP), but with a president who joined the political opposition just before his re-election in the first free presidential elections of June 1993 (Ginsburg, 1995, pp. 468–469). Mongolia introduced wide-ranging reforms in monetary and fiscal policies, privatisation of public assets and liberalisation of prices and markets in the post-1990 period. According to the Deputy Governor of the Central Bank, financial reforms have played a key role in the transition process. Before 1991 the financial system was completely centralised. Now there are in total 13 banks, of which 12 are commercial (shareholder, state-owned and private) banks, with the Central Bank moving towards a steering role in the newly emerging (but still very poorly operating) financial markets.[6]

A stock exchange has been operating for some years and substantial banking reforms have been implemented; in early 1995 the follow-up of privatisation was launched, in which a secondary market was opened for vouchers. The privatisation of small enterprises (through the so-called 'red vouchers'), including the small-scale service sector and manufacturing, seems to have been quite successful although a solid (legal, credit, marketing, information) institutional framework was lacking in which these newly emerged enterprises would be able to flourish.[7] In the agricultural sector the ownership of most of the collectively managed herds has by now been transferred to families through a voucher scheme. The large-scale enterprise privatisation (the 'blue vouchers') was a much more complicated problem than was estimated beforehand. At the outset of the privatisation campaign in 1991, the government decided that in strategic sectors such as energy, mining, some food industries and construction, large enterprises would remain in state hands (World Bank, 1994, pp. 9–10). In the agricultural sector, although nominally all capital-intensive crop, animal husbandry and fodder farms were 'privatised', the state retained a minimum of 51% of the shares, while the rest of the shares are now mostly held by the workers and former management (ADB, 1994, p. 31). Agro-industry and trade parastatals continue to exercise monopsonistic powers in agricultural markets, making it difficult for newly privatised companies to operate efficiently in markets that are 'missing' or disarticulated.

As we noted, GDP declined dramatically in the first post-reform years (Table 1), which was partly due to the sudden collapse of the CMEA and the loss of traditional external trading outlets and cheap imported inputs (capital goods, agricultural inputs, raw materials), food and consumer goods.[8] Industry, the capital-intensive agricultural sector and the construction sector showed severe contraction as a consequence of the import squeeze and the disarticulating effects of break-up of the previously centrally planned system of vertical integration of production sectors (ADB, 1994, p. 71). With price liberalisation implemented since early 1991, in conditions where the soft budget sector was still important (World Bank, 1994, p. 7), inflation spurted, causing macroeconomic destabilisation, but also affecting—through a rapid deterioration of the 'barter terms of trade'—the important sector of traditional livestock farmers or herdsmen.[9]

The external trade figures in Table 1 make the enormous and rapid reduction of imports clear. As the country had been strongly import-dependent on the CMEA, the collapse of this captive external trade system had grave consequences for the domestic economy. The drastic import reduction that followed, from an estimated $1 912 million in 1989 to only $361 million in 1993[10], particularly affected the capital-intensive (and import-dependent) industrial and agricultural sectors. As a consequence it depressed domestic supply of agro-industrial output, levels of processed agricultural Mongolian exports and, most importantly, the domestic supply of food staples. The general contraction of the economy, in particular in a country as large as Mongolia is, can also be noted from the dramatic drop in road and railway transport volumes (in part caused by severe fuel shortages). Total transport in million ton-km had declined by 45.3% by 1991 in comparison with the last 'normal' pre-reform year, 1989 (World Bank, 1992, p. 174).

After a severe slump in economic development, a near standstill in 1992, with regular power failures and breakdowns of the crucial heating systems during the winter, in 1994 the first signs of economic recovery could be noted, with expanded volumes of copper production, new exports of mined gold, and the emergence of a small and medium enterprise sector in some branches of light industry and services. The extensive livestock farming sector revived somewhat from the shock of the exceptionally cold winter of 1992–93 (killing 0.5 million head of cattle), but the capital-intensive agricultural sectors deteriorated still further (see Table 2). The economic reform programme also included a sharp reduction of government expenditure as a share of GDP; while in 1990 budgetary expenditure still represented 51.9% of GDP, in 1993 this was estimated to have dropped to 28.3%. With the programme of privatisation the existing tax base (mostly enterprise turnover tax) was eroded, although new VAT and income taxes filled at least part of the emerging fiscal gap. In terms of current revenue and expenditure the Mongolian government budget is by now a balanced one, but capital expenditure is nearly all financed by external (donor) resources.[11] With inflation in 1994 brought down to more manageable levels of two digits, and on the basis of the first recovery of GDP growth, the Mongolian transition to a market economy is now seen as rather successful. However, taking into account the emergence of widespread poverty (26% of the population was below the poverty line in March 1994; UNDP, 1995) and the systemic institutional disarray of domestic markets, a serious review of this superficial conclusion is warranted.

In reviewing the sequencing and content of the macroeconomic reforms in Mongolia in the post-1990 period, one is struck by the overall emphasis that was given to privatisation in all sectors of the economy, based on the mainstream assumption that with privatisation of assets (such as land and capital) rural producers will be integrated into new—competitive and efficient—markets that are supposed to emerge more or less spontaneously. Interestingly enough, this over-emphasis on property relations was noted by the first economic study of the World Bank on Mongolia (World Bank, 1992, p. 33). This observation was not made to promote a slowdown of the privatisation process, but to emphasise the importance of comprehensive reforms in other areas that were crucial for the success of privatisation. However, a recent study financed by UNDP went much further and stated that privatisation had 'failed on every account', as it did not bring about 'allocative efficiency', had brought about renewed 'monopoly powers' in markets and had a 'zero or negative effect on aggregate rate of savings' (UNDP, 1994a, p. 10). This critique of the reform process was not shared by a second World Bank study, which saw the privatisation programme as an important achievement which would 'increase efficiency in key sectors of the economy' (World Bank, 1994, p. 9). Nevertheless, privatisation was often a complex mixture of transfer of ownership shares to workers of enterprises and continued state ownership, while privatisation and price reforms were insufficiently complemented by improvements in rural marketing (ADB, 1994, p. 11).

As in the cases of the agrarian transitions in Uzbekistan and Kyrgyzstan, what is missing in the debate on agrarian reform in Mongolia is the crucial element of market development (Spoor, 1995). As in many FSU countries, in the Mongolian economic reform the macroeconomic changes lack adequate microeconomic foundation (ADB, 1994). The institutional context that is crucial for the construction of markets is still weak, which means that a transfer of ownership rights does not automatically lead to the emergence of a dynamic entrepreneurial private sector nor to competitive or efficient markets. It is even questionable whether the emphasis on privatisation contributed to breaking the power of the *nomenklatura*, as Aslund (1994) suggested as one of the important advantages of a swift process of privatisation in the case of

Russia. The rural *nomenklatura* in Mongolia seems to have been the principal beneficiary of the agrarian reform which will be analysed in the next section.

Reforms in the agrarian sector

The dual structure of the agricultural sector which emerged during the Tsedenbal regime had brought most of the traditional nomadic livestock producers into agricultural cooperatives (*negdels*), while a capital-intensive crop, breeding and fodder-producing sector was concentrated in 72 state farms (of which 20 were primarily dedicated to produce fodder, related to the State Emergency Fodder Fund, a sort of national bufferstock of animal feed). In the late 1980s the 52 crop-producing state farms cultivated 75% of arable land, producing 70% of crop output, while 255 cooperatives had 25% of arable land, while producing 90% of meat and 70% of milk (World Bank, 1994).

As in other formerly socialist economies, in the second half of the 1980s in Mongolia *perestroika* introduced some market reforms. In 1988 a limited liberalisation of sales in excess of state order quotas was introduced, while a year later some relaxation of restrictions on private herd ownership followed (World Bank, 1992, p. 27), which to a certain extent had already been tolerated within the *negdels*. This was the prelude to widespread economic reforms during the post-1990 period. In 1990 all restrictions on private ownership of cattle were removed and a beginning was made with the freeing of retail prices and further limitation of administrative pricing. In the agricultural sector, from 1991 onwards, the privatisation of the existing *negdels* moved very fast. While before 1990 only 25% of cattle was privately owned, this had become 95% by the end of 1994. By that time the state farms had been transformed into 330 shareholding companies with shares held by the workers and management, as well as partial or complete state ownership. The livestock cooperatives had given birth to 387 new entities, such as shareholding companies, limited liability companies and smaller cooperatives (ADB, 1994, p. 31). Only the relatively small number of 2 000 private crop-producing farms had been formed, occupying a total land area of 60 000 hectares (UNDP, 1994a, p. 102).

It is estimated that 70 000–80 000 herdsmen have organised themselves in livestock and fodder companies and small voluntary cooperatives or associations (known as *horshoo*). A further 70 000 herdsmen are private independent livestock producers, with some of them organised.[12] Rural wealth, closely related to ownership of cattle, has become more differentiated than before, and rural poverty rapidly (re)emerged. While it is estimated that most of the private herds are below 100 head, in 1992 59% of rural households had less than 50 animals, seen as the poverty line for a livestock producer, and 19% had fewer than 10 animals, equal to extreme poverty (UNDP, 1994a, p. 78). The latter stratum, consisting of several tens of thousands of herders' families, have insufficient cattle to survive, being forced to work for richer families to supplement their income.[13] Taking into account the fact that agricultural wages lagged far behind the trend of wages in industry, construction or trade, it can be understood that income disparities are increasing rapidly.[14] Privatisation meant—for those who did not manage to get sufficient cattle—a significant decrease in living standards. Economies of scale have been lost by forming small herds, managed by private herdsmens' families. Social effects of the reforms include children of rural families being taken from schools because their labour power was badly needed to manage the herds. It is estimated that by 1992 there was a drop-out rate of 25% of the total number of students since the beginning of reforms, at all levels of the educational system (ADB, 1994, p. 39).[15] Furthermore, traditional roles for women (such as gathering fuel, which is mostly cow dung) are being re-emphasised in the 'new' division of labour of the households. Finally, there is a serious deterioration of rural health services and social services in general, by which women in particular are affected.[16]

At the time of writing, private ownership of land was still not legal—all land belongs to the Mongolian state—although in practice long-term leasing of land is already legalised. The new Land Law, already visualised in late 1991, but submitted by the Mongolian government to the parliament (the *Great Hural*) in late 1994, was not accepted and the debate on this 'hot issue' was several times postponed. In a situation where for many centuries traditional customary rights to land and water use have reigned (which are partly returning at this moment), with a very large extensive livestock sector, it is understandable that the land issue is considered with care.[17] Legalisation of private ownership of arable land will probably be the next step, but legal land rights should allow for 'common grazing lands', leasehold tenure systems and customary rights. Furthermore, as was emphasised by a group of researchers at the Institute of Water Policy, private users have become more responsible.[18]

> However, new problems have arisen, cattle have been privatised through the voucher system, land is still state-owned but privately used, while wells are sometimes leased to private producers. The expenditure to operate and repair these tubewells is high, and deterioration is taking place. Therefore, the establishment of clearly defined water rights is very important in the current situation.

A new Water Law is now under discussion by the parliament, but in the mean time water supply and water quality have been under great pressure, in particular in the Govi steppes of the southern part of Mongolia, where water shortage and a rising mineral content of water are major problems. In the complex eco-system of the Mongolian steppe, the privatisation of herds should therefore go hand in hand with the (re)establishment of a variety of land and water rights, so as to minimise serious adverse externalities under the new market conditions.

Disarticulation of rural markets

Price liberalisation was introduced over a period of about two years, and during the same 1990–92 period the state order system was gradually transformed into 'negotiated agreements' between producers and the state, before largely disappearing in the following two years. That does not mean that state influence in price setting entirely disappeared, as some large-scale companies in crucial areas of the economy (energy, trade, construction and industry) are still partly or completely state-owned. In particular, the important agro-processing sector is largely parastatal and by nature oligopolistic. On the sequencing of reforms, UNDP (1994a, p. 90) noted critically that privatisation of the herds was quickly carried out while marketing reforms had still

TABLE 2

PRODUCTION AND YIELD OF MAJOR CROPS IN MONGOLIA (1989–1994)

	1989	*1990*	*1991*	*1992*	*1993*	*1994*
Output (000 Tons)						
Wheat	686.9	596.2	538.3	453.2	448.7	319.4
Barley	108.5	88.9	48.0	36.8	n.a.[a]	n.a.[a]
Potatoes	155.5	131.1	97.5	78.5	60.0	52.0
Hay	1 166.3	866.5	885.5	668.8	689.7	672.2
Yield (Tons/Ha)						
Wheat	1.3	1.1	1.0	0.9	0.9	0.7
Barley	1.1	1.0	0.8	0.7	0.6	n.a.
Potatoes	12.3	10.8	9.7	9.0	6.8	7.0
Agricultural Land (000 Ha)	125 532	125 656	126 131	122 381	n.a.	n.a.
Arable Land	1 347	1 347	1 285	1 217	n.a.	n.a.
Cereals	673	654	615	593	546	448
Potatoes	13	12	10	9	9	7
Vegetables	4	4	3	2	3	2
Fodder crops	148	118	80	53	26	n.a.

Sources: State Statistical Office, Ulaanbaatar; World Bank (1992, 1994); UNDP (1995).
Notes:
[a]Although precise output data are missing, it has been reported that barley forms a decreasing share of cereal output. In 1993 wheat was 91% and in 1994 even 96% of total cereal output, indicating that barley production diminished to very small volumes (closely related to the crisis in the intensive livestock sector).

to come. Some forms of administrative and monopsony pricing remained, which, in combination with galloping consumer goods price inflation, caused a deterioration of the terms of trade for the traditional livestock sector. The response was a retreat towards self-sufficiency strategies of survival, with reduced consumption of staple crops, and increasing meat and milk consumption (UNDP, 1994a, p. 89). When the state order system largely disappeared no adequate new rural marketing systems developed (lacking traders, transport, credit and local investment), causing a negative impact on the linked agro-industry. The preparation of hay and fodder, in particular for the intensive livestock sector, declined drastically. Private livestock producers retreated from markets as outlets disappeared and extension services were dismantled.

As was mentioned above, the capital-intensive, import-dependent crop and livestock sector was severely affected in the transition. In the crop sector the problems were most visible. Yields, which in Mongolia are already low because of the extreme climatological conditions, dropped rapidly after 1989 (Table 2). This was partly due to an enormous decline in the use of chemical fertilisers and pesticides, as well as to problems of mismanagement after the collapse of the centrally planned supply of inputs and disposal of output (ADB, 1994). Wheat production dropped from 686 900 tons in 1989 to only 319 400 tons, while production of barley nearly disappeared with the emerging crisis in the intensive livestock sector. Output of potatoes, an important staple food in Mongolia, in the official statistics diminished from 155 500 tons in 1989 to only 52 000 tons in 1994. However, according to UNDP (1995), most of the output of potatoes and vegetables of the emerging small-scale private farming sector (in particular located near the large urban centres) is left unrecorded.

Other sources indicate that there is growing household plot production of vegetables to supply consumer markets in the cities, but no data are available on the marketed volumes.[19] Nevertheless, a recent study by the Market Research Institute of the Ministry of Industry and Trade (MRI, 1995), based on its own surveys and official data, presented some dramatic decreasing trends for foodstuffs consumption per capita. Vegetable consumption had dropped (between 1990 and 1993) from 20.1 kg to 3.0 kg, potatoes from 23.3 kg to 7.0 kg, eggs from 28.6 kg to 2.9 kg (!) and fruit and fruit products from 9.4 kg to 1.4 kg, while meat and meat products consumption had remained more or less stable. It is not known how reliable these data are, but they indicate a dramatic decline that also has its impact in the increase in poverty, as declining incomes are confronting a severe slump in supply and rising consumer prices (with large margins that accrue to traders). The reduction in availability of foodstuffs is at least partly linked to the rapid decline of the food-processing industry and the domestic 'state order system'. The linkages of the primary material producers and agro-industry have been interrupted, the domestic marketing system is in disarray, and private herdsmen are adopting risk-aversion strategies directed at home consumption and retreat from markets (as in many cases these are 'missing'). The problems of declining agro-industrial output are also caused by management problems (where the old staff has difficulties adapting to the new rules of the market), while simultaneously there is a growing lack of imported machinery, spare parts and necessary production inputs (chemicals, packaging materials, etc.). A number of important agro-industrial products showed a strong decline during the 1991–94 period (Table 3). Again, some of the loss in production is being made up by an emerging small and medium-scale private sector, but it is unlikely that this compensates fully for the gap. Although overall industrial growth was positive in 1994 (estimated at 3.7%), according to MRI (1995), this was only due to the growth in three sub-sectors, electricity and thermal energy, non-ferrous metals, and building materials. In all other (indeed less dominant, but still very important) branches, and particularly agro-industry, substantial declines were noted in 1994 (in comparison with the previous year), such as leather and fur (−26.4%), textiles (−41.7%) and foodstuffs (−26.3%).

Concluding notes

With the economic reforms and the dramatic change in the external environment for Mongolia, the dualistic economic system that had been dominant over the past decades of central planning is being severely undermined. In part, this is not negative as the large traditional livestock sector was 'drained' for resources, which were transferred to the modern sector. This inefficient and costly capital-intensive crop sector is now in serious decline, as cheap imports were cut and subsidies were reduced. However, no significant private crop farming sector has emerged as a consequence of privatisation of arable land, because there are serious doubts about the economic viability of small-scale farming in Mongolia, and because of the indivisibility of the equipment that was used in this 'modern' sector. The privatisation of livestock, the mainstay of the Mongolian agricultural sector, gave a positive incentive to overcome the underdevelopment of this sector, but the absence of market institutions and proper incentive structures seems to be causing retrenchment by the herdsmen.

With the break-up of the state order system of procurement of agricultural and

TABLE 3

PRIMARY AND AGRO-INDUSTRIAL OUTPUT OF MONGOLIA'S LIVESTOCK SECTOR (1989–1994)

	Unit	*1989*	*1990*	*1991*	*1992*	*1993*	*1994*
Agricultural products							
Meat	000 Ton	239.6	248.9	281.2	251.2	256.4	–
Beef	000 Ton	72.8	66.2	83.8	75.7	77.5	–
Mutton and goat meat	000 Ton	121.9	132.3	135.9	116.3	122.3	–
Pork	000 Ton	5.5	7.9	3.8	1.8	1.5	–
Sheep's wool	000 Ton	19.4	21.1	21.5	21.0	20.8	–
Milk	000 Ton	319.3	315.7	311.3	308.1	283.4	–
Eggs	Mln	35.8	38.0	25.5	18.6	15.8	–
Agro-industrial output							
Meat products	000 Ton	61.7	57.8	46.9	24.7	17.2	11.3
Bread and bakery Products	000 Ton	66.7	63.3	60.6	60.9	46.0	33.9
Milk and dairy Products	Mln Ltr	62.0	59.6	50.6	27.7	12.9	4.9
Leather Jackets	000 Unit	–	–	194.2	141.1	160.1	35.5
Sheepskin Coats	000 Unit	180.2	138.1	111.5	99.4	86.6	57.1
Carpets	000 Sq M	2128.1	1971.2	1400.2	1037.0	1000.1	681.5

Sources: State Statistical Office, Ulaanbaatar; World Bank (1992, 1994); Market Research Institute (1995); UNDP (1995).

livestock products, although some important trading parastatals still remain operative, new market structures are far from rapidly emerging. An Agricultural Commodity Exchange (MACE) started to function in 1991, with a 'network of brokers at national, provincial and district level', with the state as the largest minority shareholder (UNDP, 1994a, p. 88), and administrative pricing is still practised by parastatals. Through a licensing system and limited credit provision, private traders are constrained in their operations (ADB, 1994, p. 72). Livestock marketing, under the seasonal constraints dictated by the extreme climatological and geographical conditions of Mongolia, needs an intricate system of backward and forward linkages that hardly exist. Decentralised processing of meat products is a part of this linkage, while at the moment most agro-processing factories are large and concentrated in Ulaanbaatar. Therefore, herdsmen opt out of markets or cattle have to be moved large distances, with subsequently low weights at slaughtering. Also wool and cashmere marketing need particular transport, processing and quality standards that are at this moment extremely inadequate. The absence of a combination of legal framework and micro-institutions (including extension services, credit banks and local traders and warehouses) has aggravated the agrarian crisis, which is reflected in greatly increased income disparities, rural poverty and declining health services. Privatisation of the herds could lead to the building of a strong livestock sector, but in the current circumstances market development in this sector is absolutely crucial, and in its absence the sector might slide into further decline.[20]

What should not be underestimated are the limitations from which the Mongolian economy suffers in terms of its small home market, in particular taking into account sharply reduced wages and the increased poverty that is widely emerging. The recent recovery of the macro-economy depends very much on the exports from the mining sector and the impact of the fast growing services, trading and construction sectors (the latter having benefited substantially from the large quantities of foreign aid projects). This development, however, hides structural problems that are still to be solved in the complex transition being undertaken. As this article has emphasised, these problems—relating especially to the building of markets and their institutional framework—are of crucial importance in Mongolia's traditional livestock and crop agriculture sectors.

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This article is part of an ongoing research project on Macroeconomic and Agrarian Transformation in the former Soviet Central Asian Republics and Mongolia. It also includes outcomes of discussions with scientists of Mongolian academic institutions in which the author participated during a mission undertaken for the Dutch Ministry of Development Cooperation in February 1995. An earlier draft was presented at the Institute of Social Studies in October 1995, as a paper in the Rural Development Seminars. The author is grateful for comments from Alex Izurieta, Geske Dijkstra and participants of the RDS-seminar.

[1] The cities in Mongolia are heated during the long winter by central heating systems, supplied by large coal-burning plants. Warm water and steam losses are enormous and the technology is outdated, causing air contamination. A traveller who lands in the midst of the severe winter months is shocked by the contrast between the 'pure' white Gobi desert and the thick layer of smog which covers Ulaanbaatar.

[2] The 'soft budget sector', using Kornai's terminology, is defined as the public sector enterprises which are compensated for their losses by transfers from the government budget or through soft—i.e. subsidised—loans from the state bank. However, there are also previously state-owned firms that are 'privatised' (owned by previous managers, with partly remaining state assets, as shareholding companies or with other forms of ownership). If such PSOE (post-state-owned enterprises) are still able to obtain soft loans or budget transfers (because of existing vested interests and political networks of managers) they would still be part of the 'soft budget sector'. On the other hand, a state-owned enterprise which is treated as financially autonomous and which will go bankrupt if it makes continuous losses is confronted with Kornai's 'hard budget constraint'.

[3] UNDP (1995, p. 16) notes that 'a significant proportion of the private production, especially close to the urban centres, is not being recorded in the official figures', while observing that vegetable availability in Ulaanbaatar 'is likely to be similar to last year'.

[4] The 'state order system' in a command economy stipulated the relation between the state and collective farms and the state by quantifying the output quota to be sold to the procurement parastatals.

[5] The country has substantial quantities of natural resources. The copper mine at Erdenet, which is run by a joint venture with Russia, is one of the largest in the world. Furthermore, coal production is of strategic importance for Mongolia as fuel for energy generation during the severe winter. While these mineral resources are of great importance for the development of Mongolia, their commercial exploitation (with sometimes outdated technology) has also contributed to serious environmental problems.

[6] Interview with the Deputy Governor of the Mongol Bank (Central Bank of Mongolia), B. Ayush, February 1995, Ulaanbaatar, Mongolia. In other interviews and visits to banking institutions, it was made clear that the authorities were attaching great importance to a rapid upgrading of the financial system. However, it was still mainly concentrated in Ulaanbaatar, with loan portfolios mostly directed to industry, agro-industry, services and trade.

[7] The urban small-scale service sector (barbers, cafes, restaurants, retail shops) was rapidly growing in 1994, in comparison with the previous year (World Bank, 1994).

[8] Mongolia's food dependence was substantial during the 1980s, when it imported on average 37 800 tons of refined sugar, 12 900 tons of rice and 33 600 tons of wheat flour from the Soviet Union per annum in the period 1980–89 (Zeimetz, 1991).

[9] On the one hand consumer good prices went up rapidly; on the other hand, state procurement (albeit in reduced form) still continued at low fixed prices (Lee, 1993, p. 630).

[10] Before 1991, when the CMEA disintegrated, all trade between member states was done in transferable rubles. *Ex post* conversion to US dollars at the official exchange rate therefore greatly overestimates import values in dollars during these years.

[11] According to World Bank (1994), in 1993 the investment rate increased to 18.8% of GDP, almost exclusively financed from foreign resources. This situation is similar to Kyrgyzstan, both being considered as 'donor's darlings'.

[12] The former category is organised in the National Union of Agricultural Cooperatives, the latter (albeit only some of them) in the Private Herders' Associations. See UNDP (1994b).

[13] The total number of herdsman families is estimated to be in the neighbourhood of 180 000. They often lack experience, while government extension services have fallen into disarray. In an interview with the Director of the Agricultural Economics Institute, Dr Yl. Alya, University of Ulaanbaatar, February 1995, this was confirmed.

[14] MRI (1995) presents an index of 'monthly average wage per worker' for these different economic sectors. While in industry, construction, trade and services (with 1990 = 100 as base year), this index has risen in the first half of 1994 to 1540, 1500 and 1640 respectively, while in agriculture it was not more than 931. According to these data, all wages remained behind inflation, with the average wage index rising to 1740 and inflation index (CPI) to 2292.

[15] In a field trip during wintertime in Mongolia, at a temperature of around − 20 C°, the author met two children of around 10–12 years old, on their typical small Mongolian horses, taking care of a large herd of sheep. They did not go to school any more. According to the Ministry of Labour and Population, in an interview with the Director-General of the Population and Social Policy Department, Dr Khorloo Enkhjargal, this was confirmed as being a problem.

[16] Interview by the author with the Deputy Director of the Population Teaching and Research Centre, Puntsag Tsetgee, February 1995, Ulaanbaatar, Mongolia.

[17] For a good discussion of the issue of customary usufruct rights and leasehold tenure systems see the chapter written by Jeremy Swift (Institute of Development Studies, Sussex), in UNDP (1994a), the report on poverty in Mongolia, produced by a team that was led by Keith Griffin.

[18] Interview with the Scientific Secretary of the Institute of Water Policy, Dr Bu. Myagmarjav, February 1995, Ulaanbaatar, Mongolia.

[19] Interview with Ts. Maidar, Coordinator of the Poverty Alleviation Study Centre, Ulaanbaatar, February 1995.

[20] In an interview with the Director of the Agricultural Economics Institute this necessity was stressed. Also the Deputy Minister of the National Development Board emphasised in a conversation with the author that the integration of the traditional livestock sector into the new market economy was still *terra incognita* and needed urgent attention (also from the donor community). Interviews conducted in February 1995, Ulaanbaatar.

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