12

How well planned were the Five-Year Plans?

CHAPTER OVERVIEW

The Five-Year Plans for industry were ambitious and far-reaching. They envisaged nothing less than the transformation of the Soviet Union into a great industrial power. Central planning would replace the capitalist market as the main device for managing the economy.

The plans soon hit problems as the central planning system found it could not cope with the demands it had imposed on itself. The First Five-Year Plan was marked by its outrageous targets for INDUSTRIAL ENTERPRISES. The workers suffered as their needs were pushed to the bottom of the scale of priorities. Yet, despite all the problems, the plans were successful in many respects.

INDUSTRIAL ENTERPRISE
Large factory, mine, etc. or collection of factories, mines, etc. run as one unit.

ACTIVITY

What do Sources 12.1–12.7 below suggest about:
a) the attitudes of certain groups towards the big push for industrialisation
b) the scale and vision of the venture
c) the idea of socialism in comparison to capitalism in the 1930s?

SOURCE 12.1 S. Kotkin, *Magnetic Mountain: Stalinism as a Civilisation*, 1995, p. 35

The transformation of the old Russia into the USSR was viewed as tantamount to the discovery of a new continent by one contemporary geographer... To the majority of people who participated in building it, socialism in the USSR afforded the means to acquire a niche, as well as a sense of pride, in a society that did seem to be qualitatively different – in comparison with capitalism, which was then synonymous not with wealth and freedom but poverty and exploitation, as well as imperialism and war.

SOURCE 12.2 A. Bullock, *Hitler and Stalin: Parallel Lives*, 1991, p. 298

A young Komsomol [Young Communist League] member leaped at the opportunity to organise a shock brigade [see page 181] in 1929. 'When we went to work in the factories, we lamented that nothing would be left for us to do, because the revolution was over, because the severe [but] romantic years of civil war would not come back, and because the older generation had left to our lot a boring, prosaic life that was devoid of struggle and excitement.'

SOURCE 12.3 A. Nove, *An Economic History of the USSR, 1917–91*, 1992, p. 193

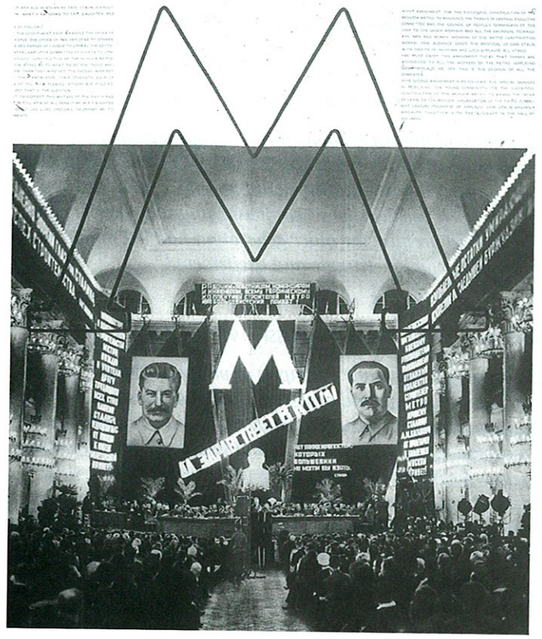
There were, in the later years, all too many examples of phoney official superlatives, which gave rise to widespread cynicism. So it is all the more necessary to stress that thousands (of young people in particular) participated in the 'great construction projects of socialism' with a will to self-sacrifice, accepting hardship with a real sense of comradeship. Statistics will also be cited to show that others had very different attitudes to their work, not only prisoners and deportees but also peasants fleeing collectives.

SOURCE 12.4 S. Kotkin, *Magnetic Mountain: Stalinism as a Civilisation*, 1995, p. 93

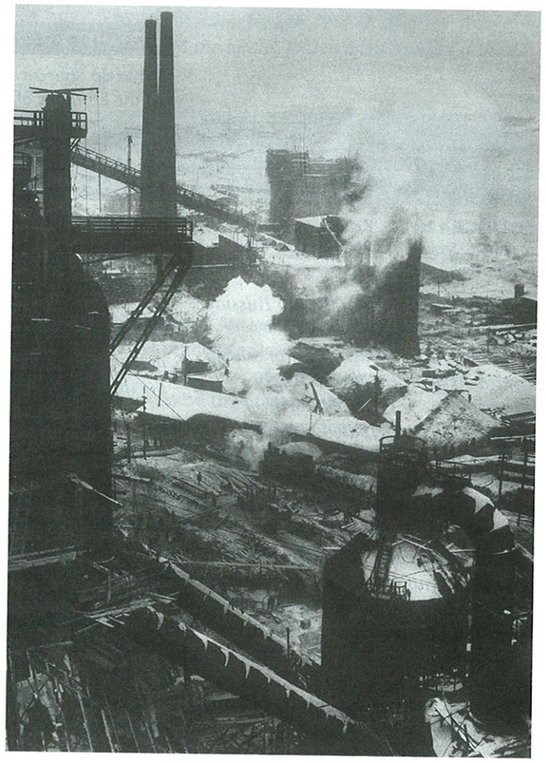
A group of young enthusiasts, working double shifts, whole days without rest and with little food, met to discuss the work on blast furnace no. 2, 'their' furnace, the Komolska. One of them opened the meeting by asking, 'Does anybody have any suggestions?' Someone else was quoted as saying, 'What kind of suggestions could there be – everybody straight to the site for a subbotnik *[any time extra time was performed without compensation].' If we are to believe the credible account from which this conversation is taken, the youths 'worked till dawn'. Such pathos was genuine and it was widespread. 'Everyone, even the labourers, felt that Magnitogorsk [steel works] was making history, and that he, personally, had a considerable part in it,' wrote John Scott [see case study, page 175], himself deeply affected by the enthusiasm of the crusade. 'This feeling was shared to some extent even by the exiled kulaks.'*

SOURCE 12.5 The Dnieprostroi Dam, built in the 1930s, increased Soviet electric power output fivefold when it began operating

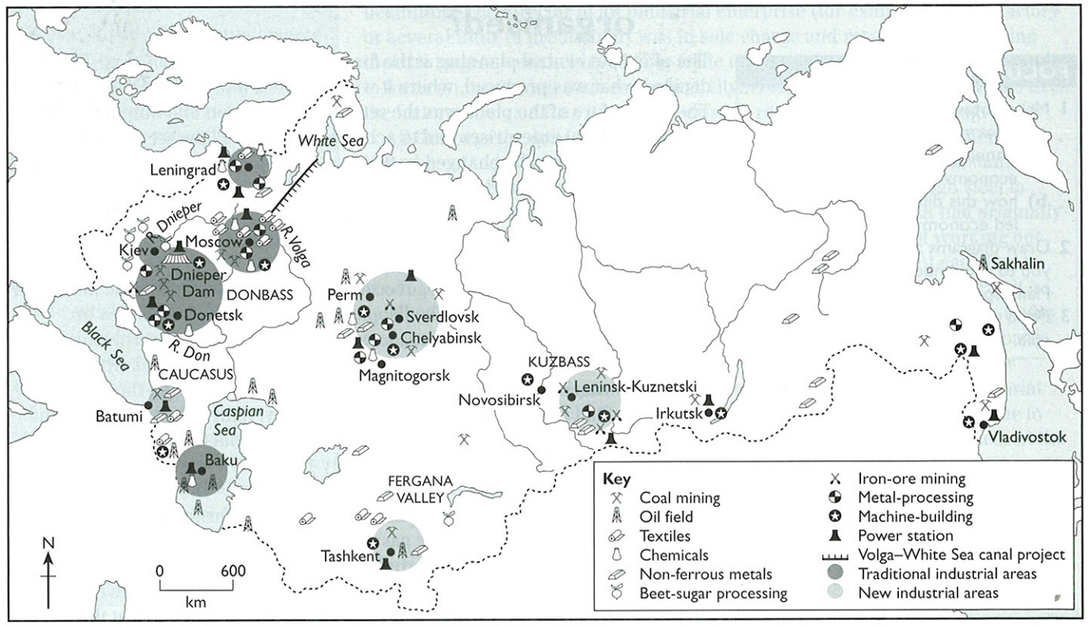
SOURCE 12.6 The Moscow metro, built in the 1930s, was a showpiece of Soviet construction



SOURCE 12.7 The Magnitogorsk steel works, 1932. Magnitogorsk rapidly developed into a major industrial centre in the early 1930s



12A Major industrial centres in the 1930s



MAGNITOGORSK CASE STUDY

Throughout this chapter the development of the industrial centre at Magnitogorsk in the Urals, 'the most celebrated of the new, superior industrial age' (S. Kotkin, *Magnetic Mountain: Stalinism as a Civilisation*, 1995, pages 34–35), is used as a case study to show what general policies involved when translated into practice. Magnitogorsk was designed to be the socialist city of the future, inhabited by Soviet Socialist Man (*Homo Sovieticus*). Two main sources are used for the case study:

- **Stephen Kotkin, *Magnetic Mountain: Stalinism as a Civilisation*, 1995. This outstanding study is an example of the recent trend among some Western historians of focusing on the experiences of the Russian people. Kotkin looks at the relationship between the authorities and the inhabitants of Magnitogorsk. The latter were not mere passive clay in the hands of the authorities; they knew how to make the best of their situation and which rules could be bent. So the people and the authorities influenced each other in the creation of the new city and the attempt to create new sociqlist citizens. He gives a vivid picture of the life of the newly urbanised Soviet workers of the 1930s that emphasises chaos and population movement. Thus the reintroduction of the tsarist internal passport system appears not as the culmination of a premeditated policy designed to establish total control over the populace, but rather as a typically heavy-handed Communist improvisation to combat a problem their policies had done so much to create.**
- **John Scott, *Behind the Urals*, 1942. Scott was an American college student who left the Depression-hit USA in 1932 to take part in the great experiment. He became a member of the Communist Party and spent several years as a volunteer worker at Magnitogorsk. Sympathetic to the aims of the socialist authorities, he nevertheless reveals the problems and hardships of life in the front-line of the industrial expansion. His book is regarded as the best eyewitness account by a Westerner.**

The idea that the Soviet Union was at last on the road to socialism, via industrialisation, inspired party members and urban workers alike. There was a feeling that they were creating a new type of society that would be far superior to that of their capitalist neighbours. After the compromises of the NEP, there was a return to the war imagery of the Civil War and War Communism. There was talk of a 'socialist offensive', and of 'mobilising forces on all fronts'. There were 'campaigns' and 'breakthroughs', 'ambushes' by 'class enemies'. People who opposed or criticised the regime's policies thus became guilty of treachery.

The creation of this state of psychological warfare, with appeals to patriotism, was a useful device to push through policies, particularly since mistakes and failures could be blamed on the enemy. But many Communists did see the struggle as a war against backwardness and enemies inside and outside the Soviet Union. Industrialisation was the way to break through to socialism and to protect themselves from the hostile forces that appeared to be surrounding them.

A How were the Five-Year Plans organised?

FOCUS ROUTE

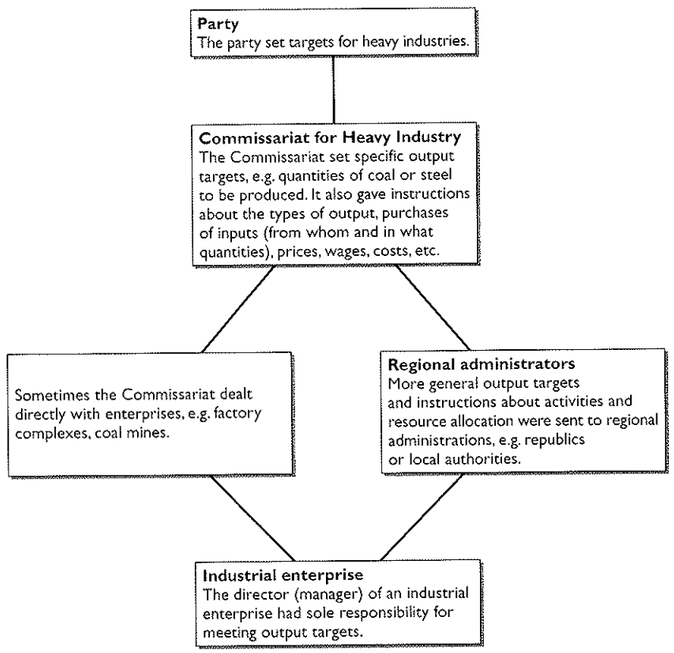
1 Make notes to explain:
   a) what you understand by central planning or the 'planned economy'
   b) how this differs from a market-led economy.
2 Draw diagrams and charts to help you to remember how the Five-Year Plans operated.
3 Make notes to explain Gosplan's role.

The plans put central planning at the forefront of the Soviet economy. The state decided what was produced, where it was produced and when it was produced. The key feature of the plans was the setting of production and output targets which industrial enterprises had to achieve. Five-Year Plans set down broad directions and could be changed as they went along. There were also shorter one-year or even quarterly plans which set more specific targets for individual enterprises. The targets were backed by law, so failure to meet targets could be treated as a criminal offence. Bonuses were paid to enterprises that exceeded their plan target.

The party, acting through the government, set the priorities for the plans and the targets for key industries. The People's Commissariats (ministries or government departments) were responsible for working out more detailed plans for different regions and the enterprises under their control. Although there were varying numbers of industrial commissariats during the 1930s, four major ones had developed by 1934: heavy industry, light industry, timber and food. The most important of these was the Commissariat of Heavy Industry, which headed the industrialisation drive. By 1939, there were twenty commissariats.

In theory, industrial enterprises could have a say in formulating the plan but, in practice, instructions would be passed down through various bureaucratic layers to the managers of the enterprises. Chart 12B shows a simplified diagram of how the system worked using heavy industry as an example. However, this system emerged only as the plans developed and was not in place at the beginning. The planning of the First Five-Year Plan was much more chaotic.

12B How the Five-Year Plans were administered using changes to heavy industry as an example



Learning trouble spot

What is the difference between central planning and capitalism?

In a capitalist market economy, the production of goods and the allocation of resources and investment in industry are largely determined by supply and demand working through prices, that is, by the operation of the market. The demand for a product pushes up the price of that product. This encourages producers to enter the market to supply the product and make a profit. They bring the necessary investment in industrial plant and make decisions about the methods and techniques used to produce and distribute the goods. In this way, resources – raw materials, land and labour – flow to this particular industrial activity.

In a centrally planned system, state agencies co-ordinate the activities of the different branches of production. They make the decisions about the allocation of resources, where investment should be targeted, what methods of production should be used and what economic strategies should be followed.

WHAT HAPPENED TO PRIVATE INDUSTRY?

The state already had control of large-scale industry (run by trusts) under the NEP, so these were brought into the new system. But there were quite a lot of small-scale private industries supplying consumer goods such as shoes and textiles. These were starved of supplies and resources and most collapsed during the First Five-Year Plan. This was a disaster for the Russian consumer who found it very hard to get clothing, shoes and other products. The situation was compounded by the collapse of cottage industries in the countryside due to collectivisation. Peasants had traditionally made clothes, tools and other products for a domestic market and these were swept away in the collectivisation upheaval. Most industrial enterprises of any size were under state control by the end of the 1930s.

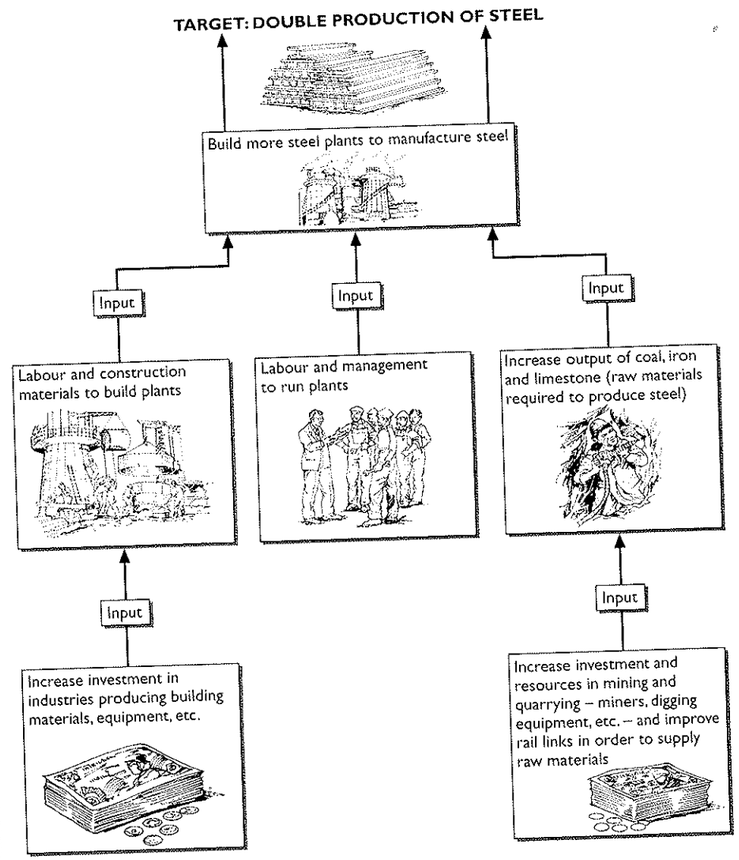
Sergei Ordzhonikidze
'Sergo' had joined the Bolshevik Party in 1903 and became active in the underground political scene where he became friends with Stalin. Elected to the Central Committee, he played a prominent role in the revolution and the Civil War. He worked with Stalin in Georgia and it was he who struck the Bolshevik official in the incident which upset Lenin so much (see page 127). He was one of Stalin's staunchest supporters in the Politburo during the First Five-Year Plan. His key position as head of the Commissariat of Heavy Industry put him in the driving seat of the push for rapid industrialisation. He was reasonably popular in the party and was a moderating influence in the Politburo.

It was a top-down method of management which applied in the workplace as well. The principle of one-person management was established right at the beginning. The director of an industrial enterprise (for example, a large factory or several units of production) was in sole charge and responsible for seeing that the targets were achieved. The trade unions were told not to interfere and to focus on increasing worker productivity. Workers' control and influence over the factory floor, such as it had ever existed, receded as the plans progressed.

All this begs the question: who co-ordinated the activities of the different branches of industry to balance the system and make it work? For instance, if you decide to expand the railway, then you need to plan for enough steel to make the rails. Gosplan (the State Planning Commission), which had originally been set up in 1921 as a forecasting agency, was given the job of working out the figures – the inputs each industry would need and the output each had to produce – to meet overall targets for the plan (see the example in Chart 12C).

The party not only laid down basic priorities but interfered in the day-to-day running of enterprises. It had a grip on the economy at all levels. Senior party officials appointed and dismissed planners and senior managers, often for political rather than economic reasons. From 1930 to 1937, the Commissariat for Heavy Industry was led by Sergei Ordzhonikidze, who had a direct line to different factories and moved around people and resources as he wished. At the local level, the party got involved in checking whether enterprises were fulfilling the plans; party secretaries were held responsible if industrial enterprises in their area did badly.

12C Planning required to achieve targets



Features of the plans

The plans in the 1930s were dominated by an emphasis on the development of heavy industry. Stalin and the Supreme Economic Council (Vesenkha) agreed that the lion's share of investment should go into coal, iron, steel and other heavy industries. These would provide the power, capital equipment and machine tools that could be used to manufacture other products. The Soviet Union would then be less dependent on the West for these goods and could move towards self-sufficiency or 'autarky'. This decision meant that consumer industries producing clothes, shoes and similar products would be downgraded. Soviet citizens were asked to sacrifice their standard of living for longer-term objectives. There were two main reasons behind this:

1 It seemed to the Stalinists that Western industrial revolutions had been underpinned by the initial development in coal, iron and steel.
2 They were driven by the need to develop the sort of industries that could protect the Soviet Union should it be attacked from the West.

Three other features of the plans are worthy of note:

- The plans were always declared complete a year ahead of schedule. This denoted the superiority of Soviet planning over the Western capitalist economies which were, at this time, going through the worst throes of the Great Depression. It was also a psychological device to encourage the already hard-pressed workforce to even greater achievements.
- Huge new industrial centres were constructed virtually from nothing, for example at Magnitogorsk in the Urals and Kuznetz in western Siberia. Most of these were located east of the Ural mountains, a strategic decision to make them less vulnerable to attack from the West.
- Spectacular projects were conceived to demonstrate the might of the new Soviet industrial machine. This has been called 'gigantomania'. The Dnieprostroi Dam in eastern Russia (Source 12.5 on page 174) was, for two years, the world's largest construction site and it increased Soviet electric power output fivefold when it came on stream. Other projects included the Moscow–Volga canal and the prestigious Moscow metro with its elaborate stations and high vaulted ceilings (see Source 12.6 on page 174).

Foreign participation

A significant aspect of the industrial development of the USSR in the early 1930s was the involvement of foreign companies and individuals. A large number of companies sent specialists, engineers and skilled workers to help to erect new factories or exploit new resources. Henry Ford helped the Russians to develop a car industry. Russian engineers were trained by Ford in the USA and it was Ford-designed cars that were produced at the car plant in Gorky. Colonel Hugh Cooper, the engineer in charge of the Dnieprostroi Dam project, was an American. So was A. Ruckseyer, the man behind the huge growth in the asbestos industry at a remote place in the Urals called Asbest. Thousands of skilled workers – British, American and many other nationalities – came for a variety of reasons, some ideological and some because of unemployment in the West. The Great Depression convinced many people that capitalism was in its death throes and that the dynamic Soviet Union offered hope for the future of working people.

AT MAGNITOGORSK

Iron and steel were at the heart of Soviet industrialisation so the development of Magnitogorsk, with its huge reserves of iron ore, was at the forefront of the labour offensive. One contemporary Soviet pamphlet stated: 'Near Magnetic Mountain the steppe has been turned into a battlefield, the steppe is retreating.' The object of the battle was to build a gigantic steel plant capable of challenging the best in the capitalist world. In March 1929, 25 settlers arrived on horseback at the snow-covered site. By June 1930, the first train arrived with the banners 'The Steel Horse Breathes Life into the Magnitogorsk Giant. Long Live the Bolshevik Party!'

B What did the Five-Year Plans achieve?

12D The achievements and weaknesses of the Five-Year Plans in the 1930s

FIRST FIVE-YEAR PLAN
October 1928 to December 1932

The emphasis was on heavy industries – coal, oil, iron and steel, electricity, cement, metals, timber. This accounted for 80 per cent of total investment; 1500 enterprises were opened.

Successful sectors
- Electricity – production trebled.
- Coal and iron – output doubled.
- Steel production – increased by one-third.
- Engineering industry developed and increased output of machine-tools, turbines, etc.
- Huge new industrial complexes were built or were in the process of being built.
- Huge new tractor works were built in Stalingrad, Kharkov and other places to meet the needs of mechanised agriculture.

Weaknesses
- There was very little growth, and even a decline, in consumer industries such as house-building, fertilisers, food processing and woollen textiles.
- Small workshops were squeezed out, partly because of the drive against Nepmen and partly because of shortages of materials and fuel.
- Chemicals targets were not fulfilled.
- The lack of skilled workers created major problems. Workers were constantly changing jobs, which created instability.

Comment

In reality, many targets were not met. The Great Depression had driven down the price of grain and raw materials, so the USSR could not earn enough from exports to pay for all the machinery it needed. Also, a good deal of investment had to go into agriculture because of the forced collectivisation programme. However, the Soviet economy was kick-started: there was impressive growth in certain sectors of the economy and there were substantial achievements.

SECOND FIVE-YEAR PLAN
January 1933 to December 1937

Heavy industries still featured strongly but new industries opened up and there was greater emphasis on communications, especially railways to link cities and industrial centres. Four and a half thousand enterprises opened. The plan benefited from some big projects, such as the Dnieprostroi Dam, coming into use.

Successful sectors
- Heavy industries benefited from plants which had been set up during the first plan and now came on stream. Electricity production expanded rapidly.
- By 1937, the USSR was virtually self-sufficient in machine-making and metal-working.
- Transport and communications grew rapidly.
- Chemical industries, such as fertiliser production, were growing.
- Metallurgy developed – minerals such as copper, zinc and tin were mined for the first time.

Weaknesses
- Consumer goods industries were still lagging, although they were showing signs of recovery. There was growth in footwear and food processing – modern bakeries, ice-cream production and meat-packing plants – but not enough.
- Oil production did not make the expected advances.

Comment

There was a feeling in the party that Stalin had overreached himself in the First Five-Year Plan, that targets had been too high. The second plan was more one of consolidation. The years 1934–36 were known as the 'three good years' since the pressure was not so intense, food rationing was ended and families had more disposable income.

THIRD FIVE-YEAR PLAN
January 1938 to June 1941

The third plan ran for only three and a half years because of the USSR's entry into the Second World War. Once again, heavy industry was emphasised as the need for armaments became increasingly urgent.

Successful sectors
- Heavy industry continued to grow, for example, machinery and engineering, but the picture was uneven and some areas did poorly.
- Defence and armaments grew rapidly as resources were diverted to them.

Weaknesses
- Steel output grew insignificantly.
- Oil production failed to meet targets and led to a fuel crisis.
- Consumer industries once again took a back seat.
- Many factories ran short of materials.

Comment

The third plan ran into difficulties at the beginning of 1938 due to an exceptionally hard winter and the diversion of materials to the military. Gosplan was thrown into chaos when the purges (see Chapter 13) created shortages of qualified personnel, such as important managers, engineers and officials, who linked industries and government.

FOCUS ROUTE

1 As you work through pages 179–183, collect evidence about the planning system and its effectiveness and record it in a table like the one shown here.

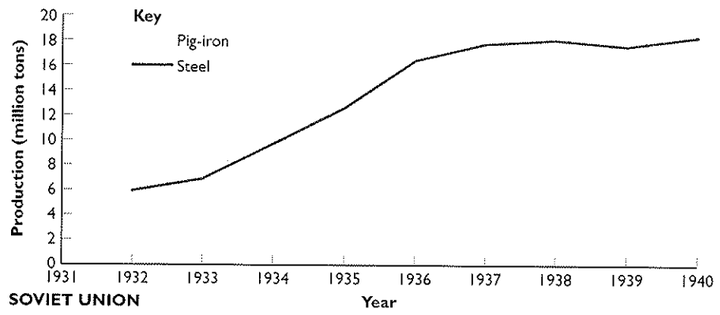
Evidence of success and achievements	Evidence of failures and weaknesses	Evidence that the Five-Year Plans were not well planned

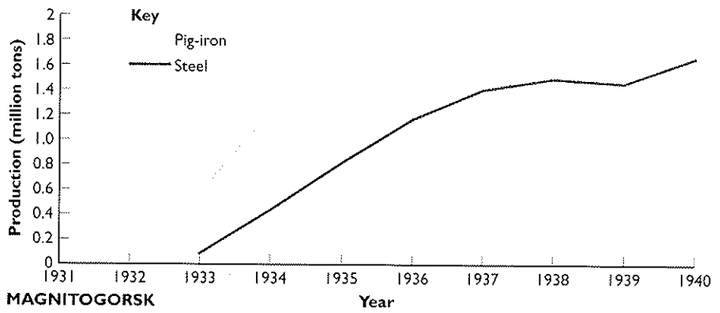
2 Who were the 'bourgeois specialists' and why were they attacked by the party?
3 Why were officials and managers reluctant to admit to problems in the plans?

SOURCE 12.8 Industrial output 1913–40, from R. W. Davies, M. Harrison and S. G. Wheatcroft (eds), *The Economic Transformation of the Soviet Union, 1913–1945*, 1994

	1913	1928	1932	1933	1936	1937	1940
Electric power (billion kWh)	1.9	5.0	13.5	16.4	32.8	36.2	48.3
Crude oil (million tons)	9.2	11.6	21.4	21.5	27.4	28.5	31.1
Coal (million tons)	29.1	35.5	64.4	76.3	126.8	128.0	165.9
Pig-iron (million tons)	4.2	3.3	6.2	7.1	14.4	14.5	14.9
Rolled steel (million tons)	3.5	3.4	4.4	5.1	12.5	13.0	13.1
Quality steel (million tons)	0.04	0.09	0.68	0.89	2.06	2.39	2.79
Copper (thousand tons)	31.1	30.0	45.0	44.3	100.8	97.5	160.9
Cement (million tons)	1.52	1.85	3.48	2.71	5.87	5.45	5.68
Mineral fertilisers (million tons)	0.07	0.14	0.92	1.03	2.84	3.24	3.24
Sulphuric acid (million tons)	0.12	0.21	0.55	0.63	1.20	1.37	1.59
Metal-cutting machine tools (thousands)	1.5	2.0	19.7	21.0	44.4	48.5	58.4
Locomotives (standard units)	265	478	828	941	1566	1582	1220
Generators (thousand kW)	0	75	1085	587	0	561	468
Electric motors (thousand kW)	0	259	1658	1385	1653	1833	1848
Tractors (thousand 15 hp units)	0	1.8	50.8	79.9	173.2	66.5	66.2
Lorries (thousands)	0	0.7	23.7	39.1	131.5	180.3	136.0
Raw sugar (million tons)	1.35	1.28	0.83	1.00	2.00	2.42	2.17
Cigarettes (billions)	22.1	49.5	57.9	62.7	85.9	89.2	100.4
Vodka (million decalitres)	118.9	55.5	72.0	0	89.7	92.5	44.3
Cotton fabrics (million linear metres)	2582	2678	2694	2732	3270	3448	3954
Woollen fabrics (million linear metres)	105	101	89	86	102	108	120

SOURCE 12.9 A comparison of pig-iron and steel production in the USSR and in Magnitogorsk





ACTIVITY

Compare the two graphs in Source 12.9. The similarities in their pattern are striking. Study Source 12.8 also, and consider why there was a slowdown in production between 1936 and 1938.

AT MAGNITOGORSK

SOURCE 12.10 Changing production targets for pig-iron during the First Five-Year Plan

		Tons per year
	1928	656,000
Summer	1929	850,000
Late	1929	1,100,000
Early	1930	2,500,000

Raw materials Firms routinely requested far more than they required because they were never sure what they would be allocated. Interruptions in deliveries were so regular that firms hoarded what they could, while at the same time bombarding the centre with requests for more of everything. Coal supplies were often found to be short on arrival, having been pilfered on the way. The plant therefore had to request more coal than it needed and probably ended up buying the 'lost coal' on the black market.

Quality Significant amounts of pig-iron and steel were found to be unusable when the time came to count up output. But even if it was declared defective, it was still sent to metal-starved firms that had little choice but to use it.

SOURCE 12.12 A. Nove, *An Economic History of the USSR, 1917–91*, 1992, p. 191. Nove recounts a story told by Isaac Babel

'One old oil expert, given what he regarded as an absurd order to increase production, is said to have written to the Central Committee as follows: "I cease to be responsible for the planning department. The [plan] figure of 40 million tons I consider to be purely arbitrary. Over a third of the oil must come from unexplored areas ... Furthermore the three cracking plants which now exist are to be turned into 120 plants by the end of the five-year plan. This despite the huge shortage of metal ... and so on." '...

Needless to say the new targets were far beyond practical possibility. The rush, strain, shortages, pressures became intolerable, and caused great disorganization. Naturally, supplies of materials, fuels, goods wagons, fell short of requirements.

The First Five-Year Plan

As the First Five-Year Plan got underway, there was a wave of planning fervour or 'target mania'. There was a sort of competition between Gosplan and Vesenkha (the Supreme Economic Council), who were bidding each other up with higher targets. The original targets set in the first plan were optimistic, but almost before it was begun targets were revised upwards. In April 1929, two versions of the plan were produced – a 'basic' and a much higher 'optimum' version. The latter was chosen. This envisaged targets being increased by astonishing amounts, for instance, coal up from 35 to 75 million tons and iron ore from six to nineteen million tons. To many, these seemed hopelessly unachievable.

Some historians have suggested that planning was more in the realms of socialist fantasy than rational calculation. In *The Russian Revolution 1917–1932* (1994, pages 129–34), Sheila Fitzpatrick talks of this period as one in which the 'spirit of a Cultural Revolution' swept people along. Party leaders and members had a millennial vision of a country that would be transformed. They believed that in two or three years they would have a socialist rather than a market economy and money would be abandoned as the main means of rewarding workers. In this sense, the First Five-Year Plan can be seen more as a propaganda device to drive Soviet citizens forward and create a sense of urgency.

Setting targets is one thing; detailed planning, which involves the complex co-ordination of different branches of industry over a huge area, is something else. And this sort of detailed planning seemed to be notably absent from the First Five-Year Plan. The party handed out broad directives and priorities and it was left to officials and managers at regional and local levels to work out ways to achieve the production targets they had been set. This was bound to lead to problems.

SOURCE 12.11 Output targets for the First Five-Year Plan, from A. Nove, *An Economic History of the USSR, 1917–91*, 1992, p. 145

	Actual output in 1927–28	1932–33 targets in first version of plan	1932–33 targets in 'optimum' version of plan
Coal (million tons)	35	68	75
Iron ore (million tons)	6	15	19
Steel (million tons)	4	8	10

The high targets placed enormous strain on the economy. Materials of all sorts were in short supply and there was intense competition to get hold of them. At higher levels, powerful people in industrial commissariats pulled strings to make sure that their pet projects got the resources they needed for completion. Materials and workers – shock brigades – were rushed into key industries to do certain jobs, often on the order of a senior party official, despite the fact that this left other areas short and waiting for supplies. At the regional and local levels, factories competed with each other for scarce resources. Bribery and corruption were rife. Managers made illegal deals in their desperation to get the parts or supplies they needed to fulfil their targets. Some were known to hijack lorries and ambush trains to get supplies intended for other plants. Bottlenecks appeared everywhere due to shortages of materials and the inadequacy of the transport system. The railways could not cope with what they were expected to transport: it soon became clear that the planners had not invested enough in track or rolling stock.

The net result of this was twofold:

1 In some parts of the economy there was underproduction because factories were held up by shortages of materials. In other parts there was overproduction as factories rushed to exceed their targets.
2 There was a great deal of wastage because:
   a) overproduction created thousands of parts that other industries did not want
   b) much of the output was sub-standard, such as lorry tyres that lasted for only a few weeks.

What made matters worse was that few managers or officials were prepared to admit anything was wrong. They did not want to be accused of sabotaging the plans or criticising the party. So mistakes were covered up and problems were left unresolved. It was all buried in the colossal amount of paperwork that flowed around the USSR. All that mattered to managers and officials at different levels was that they could show they had achieved their targets, whether this was real or invented. In fact, there were extravagant claims of over-fulfilment in many areas. This seemed to confirm that the system was working and discouraged others from speaking out about problems.

Of course, not all the mistakes could be covered up and somebody had to be blamed. Class enemies were ready to hand and Stalin was not slow to use this political tool in the same way as he had in the collectivisation drive. The industrial equivalent of the kulak was the 'bourgeois specialist'. These were the old pre-1917 managers, engineers and technical staff who had survived the NEP in important jobs because of their skills and abilities. Now they were identified as saboteurs who were deliberately causing hold-ups, breakdowns and general problems in the supply industries. They were uncovered and imprisoned. Show trials were held to hammer home the point to other managers.

The attack on the bourgeois specialists was not just a cynical tool to frighten others and find a convenient scapegoat for errors and miscalculations. Many party members believed that this group did harbour bourgeois, anti-socialist attitudes that would scupper their revolution: they wanted proletarians in key technical positions. Unfortunately, the loss of valuable personnel so quickly caused so many problems that by 1931 the offensive against them was quietly dropped.

In the First Five-Year Plan, consumer goods industries, such as textiles, were sacrificed to the needs of heavy industry. Other areas suffered from the closure of small-scale enterprises and workshops. These were squeezed out for two main reasons:

- They had been largely run by Nepmen.
- They could not get supplies of raw materials.

These small-scale operations might have been able to respond to consumer demand but there was no room for them in a centrally organised system.

WHY WERE OFFICIALS AND MANAGERS TOO FRIGHTENED TO ACKNOWLEDGE THE PROBLEMS OF THE PLANNING SYSTEM?

In March 1928, managerial and technical staff were accused of counter-revolutionary activities at the Shakhty coal mine in the Don Basin. Stalin was closely involved in the proceedings. The staff were forced to confess to subversive activities in a 'show trial' for all of the public to see. Five were executed and the rest were given long prison sentences.

The aim of this was clear – to intimidate managers and party officials who did not go along with the pace of industrialisation. The Shakhty trial created shock waves throughout the planning system. Gosplan was purged of pessimists and non-party members at the end of the 1920s. Statisticians who presented low targets were replaced by those who could paint a more optimistic picture.

In the early 1930s, trials of professionals and specialists were held in cities throughout the Soviet Union. In November 1930, the 'Industrial Party' show trial was held. This was a party of professionals who were supposedly organising the sabotage and wrecking of the Five-Year Plan. But this party was invented by Stalin. The accused were mainly industrialists, Mensheviks and Socialist Revolutionaries who worked for the government. In 1933, in the Metro-Vickers trial, British specialists were found guilty of sabotage.

It is therefore not surprising that managers were unwilling to admit to mistakes when it could lead to investigation and criminal charges.

The Second and Third Five-Year Plans

By the beginning of the Second Five-Year Plan, party leaders were prepared to acknowledge the problems that had resulted from the breakneck speed of industrialisation from 1929 to 1932. The severe shortages, disruptions in transport, lack of skilled workers and slower growth rates for certain industries were sufficient evidence of this. In 1932, the great leap forward seemed to be on the verge of collapse.

The second plan was revised and targets were scaled back. The emphasis was more on consolidation. The plan was worked out in greater detail for each industry and region. The People's Commissariats, which were more organised and clearly defined by 1934, gave specific targets for the enterprises under their control as well as estimates of costs, labour, prices, and so on. Investment was ploughed into the railway system, thus increasing enormously the amount of freight it was able to carry. There were new training schemes that encouraged workers to learn skills and master techniques to tackle the problem of skills shortages. There were still plenty of rough edges to the planning system – shortages, waste, and under/over-production continued – but not on the scale of the first plan.

Many of the schemes started in the first plan now came on stream, boosting industrial growth enormously. For instance, the USSR was almost self-sufficient in the production of machine tools and far less dependent on foreign imports of machinery. The Soviet Union enjoyed the 'three good years' of 1934–36 and the achievements by 1937 were impressive. The Second Five-Year Plan envisaged more resources going into consumer industries, since leaders had realised how badly the workers had suffered during the early 1930s through lack of goods and basic commodities. There were improvements in some areas, like footwear production and food processing, but as the plan progressed, resources were again diverted into other areas.

After 1937, the USSR witnessed an economic slowdown. Although there was a general increase in industrial output during the Third Five-Year Plan, some areas like iron and steel virtually stopped growing. There was a fuel crisis when the oil industry failed to meet its modest targets. As Europe moved towards war, resources were channelled into the armaments industry and this created shortages elsewhere. Alec Nove (Source 12.13) places much of the blame for this slowdown on the Great Purges that were in full swing in 1936 and 1937 (see Chapter 13). Nove claims the purges deprived the economy of valuable personnel and paralysed the ability of administrators and party officials to take the initiative and solve problems. Also, many planners were purged with the result that the planning system was thrown into confusion.

The picture at the end of the Third Five-Year Plan shows planning once more in a confused and even chaotic state, with shortages, waste and bottlenecks as growing features of the economy. Indeed, looking back over the plans it is sometimes difficult to see where the word 'planned' fits into the 'planned economy' of the 1930s. Yet this rough-and-ready system worked and, by 1941, the USSR had succeeded in creating the industrial base for a powerful arms industry.

SOURCE 12.13 A. Nove, *An Economic History of the USSR, 1917–1991*, 1992, p. 239

[The purge] swept away ... managers, technicians, statisticians, planners, even foremen. Everywhere there were said to be spies, wreckers, diversionists. There was a grave shortage of qualified personnel, so the deportation of many thousands of engineers and technologists to distant concentration camps represented a severe loss. But perhaps equally serious was the psychological effect of this terror on the survivors. With any error or accident likely to be attributable to treasonable activities, the simplest thing to do was to avoid responsibility, to seek approval from one's superiors for any act, to obey mechanically any order received, regardless of local conditions.