

VI. RAPID DEVELOPMENT OF TRANSPORT AND POST TELE-COMMUNICATIONS

Considerable progress was made in transport and post and telecommunications in China during the past ten years to meet the growing needs of industry and agriculture.

In the early years after liberation, owing to damages caused by many years of war, communications and transport were practically paralyzed, seriously hampering the exchange of commodities between cities and countryside and other places, adversely affecting industrial and agricultural production and the lives of the people. After the founding of the People's Republic of China, the work of restoring original lines of communications was successfully completed in a very short time and large-scale construction for communications began. During the seven years from 1952 to 1958 the Government appropriated no less than 13,200 million yuan on construction for communications and post and tele-communication facilities, a sum amounting to about 15.3 per cent of the Government's total investment in capital construction during that period.

As a result of the extensive building of communication facilities the backward state of transport in old China began to undergo great changes. By the end of 1958 the total length of railways actually in use was 31,193 kilometres, an increase of 42 per cent over 1949. The total length of highways was 400,000 kilometres, almost five times as much as existed in 1949. The total length of inland waterways was 150,000 kilometres, double the 1949 figure. Civil aviation lines had a total length of 33,000 kilometres, an increase of 190 per cent over the 1950 figure. Tibet, which in the past was known as a "forbidden area" for air travel, has long been accessible by plane. In addition, China-USSR, China-Mongolia, China-Vietnam, China-Korea and China-Burma air routes have also been opened. During the past ten years the volume of various means of transport has increased greatly. Compared with 1949, railway goods wagons increased 110 per cent by 1958, railway passenger carriages by 120 per cent, lorries by 120 per cent, and the dead-weight tonnage of merchant ships by more than 400 per cent.

As a result of the extensive development of communication facilities many original lines of transport were strengthened and many new lines were built. The state of extremely uneven distribution of communication lines, which prevailed in old China, began to undergo conspicuous changes. As we all know, in old China most of the railways and highways were built in the coastal regions and most of the transport facilities in the interior were exceedingly backward. Things are different now. The number of trunk railways and highways running through the extensive northwestern and

southwestern China is multiplying and modern networks of communications and transport, covering the whole country, are being formed.

The rapid development of communications and transport has greatly facilitated the exchange of goods between the cities and the countryside and accelerated industrial and agricultural production. During the past ten years the goods carried by various means of transport and the freight turnover have increased remarkably. In 1958 goods carried by modern means of transport amounted to 630 million tons, an increase of 840 per cent over the 1949 figure, and the freight turnover was 236,400 million ton-kilometres, an increase of 930 per cent over the 1949 figure. Of these, in railway traffic, goods carried increased 580 per cent, and the ton-kilometres performed increase 910 per cent; in inland waterway transport and coastwise shipping, goods carried increased 1,310 per cent and the ton-kilometres performed increased 920 per cent; in road transport, goods carried increased 2,940 per cent, and the ton-kilometres performed increased 2,660 per cent. Compared with pre-liberation peak figures the goods carried and ton-kilometres performed increased, in 1958, 80 per cent and 130 per cent respectively with regard to railway transport, 180 per cent and 70 per cent respectively with regard to water transport, and 1,130 per cent and 660 per cent respectively with regard to road transport.

With the rapid development of modern means of communications and transport in the past ten years, simple forms of transport in the countryside also enjoyed great progress. This was especially true during the big leap forward of 1958 when the rural people's communes, after having fulfilled their tasks with regard to field transport, allocated a huge amount of manpower and facilities to develop general transport. This greatly speeded up the transport of goods between cities and countryside and contributed to the big leap forward in industry and agriculture.

The efficiency of the various means of transport has increased in China during the past ten years. In comparison with 1949 the turn-round time of railway goods wagons in 1958 was shortened from 4.39 days to 2.75 days, a reduction of 37 per cent; the average daily distance covered by a railway goods wagon increased from 154.9 kilometres to 255.6 kilometres, an increase of 65 per cent; the average daily distance covered by a freight locomotive increased from 308.7 kilometres to 391 kilometres, an increase of 27 per cent; the average gross weight hauled by a freight locomotive increased from 1,011 tons to 1,704 tons, an increase of 69 per cent. In 1958 the daily efficiency per ton of capacity of lorries was 113 ton-kilometres, an increase of 530 per cent over the 1950 figure; the annual efficiency per ton of capacity of steamboats in coastwise shipping was 27,000 ton-knots, an increase of 61 per cent over 1952; the annual efficiency per ton of capacity of inland waterway steamboats was 51,000 ton-kilometres, an increase of 62 per cent over

1952; and the annual efficiency per horse-power of tug boats was 98,000 ton-kilometres, an increase of 190 per cent over the 1952 figure.

Because of the great enthusiasm for work and the creative genius of the broad masses of workers and other employees working in communications and transport and owing to the higher level of technical competence and the improved quality of equipment, the rate of labour productivity in communications and transport increased to a marked degree and transport costs continuously dropped. Compared with 1952 labour productivity increased in 1958 as follows: railway transport, more than 110 per cent, inland waterway transport, more than 220 per cent, coastwise shipping, more than 130 per cent. On the other hand railway transport costs dropped 25 per cent, inland waterway transport costs declined 51 per cent, and coastwise shipping costs declined 47 per cent.

During the past ten years speedy progress has also been made in post and tele-communications in China. In 1949 there were only approximately 20,000 post and telegraph offices in the whole country, but in 1958 the number had increased to more than 60,000. In 1958 the total length of postal routes was 3,012,000 kilometres, an increase of more than 300 per cent over the 1949 figure; the total length of long-distance tele-communication wires was 720,000 kilometres, an increase of 150 per cent over the 1949 figure; the national telephone trunk line capacity was 1.47 million, an increase of 290 per cent over the 1949 figure. By the end of 1958 as many as 98 per cent of the people's communes and 59 per cent of the production brigades of the people's communes could be reached by telephone. In 1958 the amount of business done in post and tele-communications in the whole country increased 250 per cent over the 1950 figure.

At present a network of post and tele-communications, with its centre in Peking, connecting all the provinces, municipalities, autonomous regions, special administrative regions, counties and people's communes, has been practically completed. A network of international tele-communications, with centres in Peking and Shanghai, connecting more than 30 countries, has also been established.

The great strides made by post and tele-communications accelerated industrial and agricultural production, especially during the big leap forward of 1958 when "telephone conferences" were frequently held. They played an important part in the timely exchange of experiences and in directing the big leap forward in industry and agriculture.

INCREASE IN LENGTH OF TRAFFIC LINES (I)
(kilometres)

<u>Inland waterways</u>					
	<u>Railways</u>	<u>Highways</u>	<u>Total</u>	<u>Of which: routes navigable by steamboat</u>	<u>Civil air routes</u>
1949	21,989	80,768	73,615	24,182	-
1950	22,512	99,600	-	-	11,387
1951	23,352	114,428	-	-	10,497
1952	24,518	126,675	95,025	30,508	13,123
1953	25,072	137,103	-	-	13,971
1954	25,873	146,138	-	-	15,243
1955	27,171	167,282	99,938	31,685	15,511
1956	29,237	226,318	103,619	38,304	19,082
1957	29,862	254,624	144,101	39,194	26,445
1958	31,193	400,000	150,000	40,000	32,995

INCREASE IN LENGTH OF TRAFFIC LINES (II)
(index numbers)

<u>Inland waterways</u>					
	<u>Railways</u>	<u>Highways</u>	<u>Total</u>	<u>Of which: routes navigable by steamboat</u>	<u>Civil air routes</u>
(1949=100)					
1952	111.5	156.8	129.1	126.2	115.2*
1957	135.8	315.3	195.7	162.1	232.2*
1958	141.9	495.2	203.8	165.4	289.8*
(1952=100)					
1957	121.8	201.0	151.6	128.5	201.5
1958	127.2	315.8	157.9	131.1	251.4
(1957=100)					
1958	104.5	157.1	104.1	102.1	124.8

*1950=100

RAPID INCREASE IN VOLUME OF GOODS CARRIED BY MODERN
MEANS OF TRANSPORT (I)
(thousand tons)

	<u>Total goods carried</u>	<u>Of which:</u>		
		<u>Carried by railways</u>	<u>Carried by motor vehicles</u>	<u>Carried by ships and barges</u>
Pre-liberation				
peak	-	136,650	8,190	12,640
1949	67,130	55,890	5,790	5,430
1950	115,690	99,830	9,210	6,650
1951	135,060	110,830	14,120	10,110
1952	168,590	132,170	22,100	14,320
1953	212,270	161,310	30,940	20,010
1954	264,670	192,880	43,030	28,750
1955	278,430	193,760	48,960	35,700
1956	372,150	246,050	79,130	46,960
1957	411,710	274,200	83,730	53,770
1958	633,760	381,090	176,300	76,360

RAPID INCREASE IN VOLUME OF GOODS CARRIED BY MODERN
MEANS OF TRANSPORT (II)
(index numbers)

	<u>Total goods carried</u>	<u>Of which:</u>		
		<u>Carried by railways</u>	<u>Carried by motor vehicles</u>	<u>Carried by ships and barges</u>
(Pre-liberation peak=100)				
1949	-	40.9	70.7	42.9
1952	-	96.7	269.7	113.4
1957	-	200.7	1,020.0	425.6
1958	-	278.9	2,150.0	604.3
(1949=100)				
1952	251.1	236.5	381.4	264.0
1957	613.3	490.6	1,450.0	991.0
1958	944.1	681.9	3,040.0	1,410.0
(1952=100)				
1957	244.2	207.5	378.9	375.3
1958	375.9	288.3	797.8	533.0
(1957=100)				
1958	153.9	139.0	210.6	142.0

RAPID INCREASE IN FREIGHT TURNOVER BY MODERN
MEANS OF TRANSPORT (I)
(million ton-kilometres)

	<u>Total freight turnover</u>	<u>Of which:</u>		
		<u>Performed by railways</u>	<u>Performed by motor vehicles</u>	<u>Performed by ships and barges</u>
Pre-liberation				
peak	-	40,400	460	12,830
1949	22,980	18,400	250	4,310
1950	42,690	39,410	380	2,900
1951	59,340	51,560	570	7,210
1952	71,540	60,160	770	10,610
1953	93,010	78,140	1,300	13,570
1954	113,830	93,240	1,940	18,640
1955	125,120	98,150	2,520	24,440
1956	152,060	120,350	3,490	28,210
1957	172,930	134,590	3,940	34,390
1958	236,400	185,520	6,960	43,910

RAPID INCREASE IN FREIGHT TURNOVER BY MODERN
MEANS OF TRANSPORT (II)
(index numbers)

	<u>Total freight turnover</u>	<u>Of which:</u>		
		<u>Performed by railways</u>	<u>Performed by motor vehicles</u>	<u>Performed by ships and barges</u>
(Pre-liberation peak=100)				
1949	-	45.5	54.9	33.6
1952	-	148.9	167.1	82.7
1957	-	333.1	859.0	268.1
1958	-	459.2	1,520.0	342.3
(1949=100)				
1952	311.2	327.0	304.4	246.0
1957	752.4	731.5	1,560.0	797.5
1958	1,030.0	1,010.0	2,760.0	1,020.0
(1952=100)				
1957	241.7	223.7	514.1	324.2
1958	330.5	308.4	908.1	413.9
(1957=100)				
1958	136.7	137.8	176.6	127.7

PASSENGERS CARRIED AND PASSENGER TURNOVER (I)
(absolute figures)

	<u>Passengers carried</u> (thousand persons)		<u>Passenger turnover</u> (million passenger-kilometres)	
	<u>Total</u>	<u>Of which: carried by railways</u>	<u>Total</u>	<u>Of which: performed by railways</u>
Pre-liberation				
peak	-	265,010	-	27,650
1949	134,940	102,970	15,410	13,000
1950	200,990	156,910	23,900	21,240
1951	219,860	160,370	26,850	23,050
1952	240,350	163,520	24,670	20,060
1953	350,010	228,610	34,820	28,170
1954	367,350	232,860	36,900	29,470
1955	361,250	208,010	35,190	26,740
1956	495,860	252,110	46,380	34,380
1957	622,710	312,620	49,490	36,130
1958	735,620	345,690	57,060	40,920

Note: The means of transport include railways, road motor vehicles, ships and barges and civil aviation aircraft.

PASSENGERS CARRIED AND PASSENGER TURNOVER (II)
(index numbers)

	<u>Passengers carried</u>		<u>Passenger turnover</u>	
	<u>Total</u>	<u>Of which: carried by railways</u>	<u>Total</u>	<u>Of which: performed by railways</u>
(Pre-liberation peak=100)				
1949	-	38.9	-	47.0
1952	-	61.7	-	72.6
1957	-	118.0	-	130.7
1958	-	130.4	-	148.0
(1949=100)				
1952	178.1	158.8	160.1	154.3
1957	461.5	303.6	321.2	277.9
1958	545.2	335.7	370.3	314.8
(1952=100)				
1957	259.1	191.2	200.6	180.1
1958	306.1	211.4	231.3	204.0
(1957=100)				
1958	118.1	110.6	115.3	113.3

PROGRESS IN CIVIL AVIATION

	<u>Freight turn- over (thousand ton-km.)</u>	<u>Passenger turn- over (thousand passenger-km.)</u>	<u>Total flight hours for industrial and agricultural purposes (hours)</u>
1. Absolute figures			
1950	820	9,780	-
1952	2,430	24,090	959
1957	8,250	79,870	9,168
1958	13,310	108,990	17,845
2. Index numbers (1950=100)			
1952	298.2	246.3	-
1957	1,010.0	816.4	956.0*
1958	1,630.0	1,110.0	1,860.0*

*1952=100.

EFFICIENCY OF LOCOMOTIVES AND GOODS WAGONS

	<u>Unit</u>	<u>1949</u>	<u>1952</u>	<u>1957</u>	<u>1958</u>
Average daily run per freight locomotive	km.	308.7	396.8	366.0	391.0
Average gross weight hauled per freight locomotive	tons	1,011.2	1,245.3	1,520.2	1,704.0
Average daily efficiency per freight locomotive	thousand ton-km.	295.0	434.0	477.0	600.0
Coal consumption per freight locomotive per thousand ton-km.	kg.	25.2	19.5	14.6	14.8
Average turn- round time per goods wagon	days	4.39	2.90	2.84	2.75
Average turn- round distance per goods wagon	km.	668.7	676.1	709.2	703.6
Average daily run per goods wagon	km.	154.9	233.1	249.9	255.6
Average stopping time per goods wagon per run	hrs.	-	11.4	10.7	10.4
Average speed per freight train including stops	km./hrs	19.9	25.5	25.2	25.7
Average load per goods wagon	tons	26.6	28.9	34.7	37.6
Average daily efficiency per goods wagon	ton-km.	2,509.0	4,557.6	5,999.0	6,596.0

EFFICIENCY OF LORRIES

	<u>1950</u>	<u>1952</u>	<u>1957</u>	<u>1958</u>
Percentage of lorries in serviceable condition	63.7	71.0	71.7	82.5
Percentage of lorries in actual use	30.1	39.5	66.3	77.9
Average daily run per lorry (kilometres)	79.8	109.2	162.2	174.3
Average daily efficiency per ton of capacity of lorries (ton-kilometres)	18	32	78	113

INCREASE IN LABOUR PRODUCTIVITY IN TRANSPORT
(percentage)

	$\frac{1957}{(1952=100)}$	$\frac{1958}{(1957=100)}$	$\frac{1958}{(1952=100)}$
Average amount of freight transported per person employed on railways	176.0	121.2	213.3
Average amount of freight transported per person employed in inland waterways	250.6	131.0	328.3
Average amount of freight transported per person employed in coastwise shipping	133.6	176.1	235.3

DECREASE OF UNIT COSTS IN STATE-OPERATED
TRANSPORT ENTERPRISES
(percentage)

	$\frac{1957}{(1952=100)}$	$\frac{1958}{(1957=100)}$	$\frac{1958}{(1952=100)}$
Railways	88.1	84.5	74.5
Inland waterways	60.5	80.5	48.7
Coastwise shipping	69.7	75.9	52.9

LENGTH OF POSTAL ROUTES AND TELE-COMMUNICATION WIRES
AND VOLUME OF BUSINESS (1)
(absolute figures)

	<u>Total length of postal routes (thousand km.)</u>	<u>Length of tele-communication wires (thousand kilometres)</u>				<u>Total Vol. of business¹ (million yuan)</u>
		<u>Total</u>	<u>Long distance tele- phones</u>	<u>Intra- city tele- phones</u>	<u>Intra- county tele- phones</u>	
Pre-liber- ation peak	748	561	468	93	-	-
1949	706	576	292	75	209	-
1950	863	653	308	80	265	166.4
1951	1,107	768	338	95	335	226.3
1952	1,290	882	365	111	406	243.5
1953	1,515	1,029	456	130	443	299.9
1954	1,640	1,138	487	152	499	327.8
1955	1,739	1,272	512	174	586	364.5
1956	1,811	1,856	564	216	1,076	431.4
1957	2,223	2,094	611	231	1,252	420.3
1958	3,012	3,202	719	301	2,182	533.9

¹The total volume of business transacted in post and tele-communications up to and during 1957 was calculated in terms of the prices of 1952 and the statistics for 1958 were calculated in terms of the prices of 1957. These two sets of figures are not strictly comparable.

LENGTH OF POSTAL ROUTES AND TELE-COMMUNICATION WIRES
AND VOLUME OF BUSINESS (II)
(index numbers)

<u>Length of tele-communication wires</u>						
	<u>Total</u> <u>length of</u> <u>postal</u> <u>routes</u>	<u>Total</u>	<u>Long</u> <u>distance</u> <u>tele-</u> <u>phones</u>	<u>Intra-</u> <u>city</u> <u>tele-</u> <u>phones</u>	<u>Intra-</u> <u>county</u> <u>tele-</u> <u>phones</u>	<u>Total</u> <u>volume</u> <u>of</u> <u>business</u>
(Pre-liber- tion peak year=100)						
1949	94.4	102.6	62.3	80.7	-	-
1952	172.5	157.1	78.0	118.4	-	-
1957	297.2	373.0	130.5	247.3	-	-
1958	402.8	570.6	153.7	322.6	-	-
(1949=100)						
1952	182.7	153.1	125.2	146.7	194.5	146.3*
1957	314.8	363.5	209.4	306.2	599.4	252.5*
1958	426.6	556.0	246.6	399.5	1,040.0	355.2*
(1952=100)						
1957	172.3	237.4	167.3	208.8	308.2	172.6
1958	233.6	363.1	197.0	272.4	537.1	242.8
(1957=100)						
1958	135.5	153.0	117.8	130.4	174.3	140.7

*1950=100.

RAPID DEVELOPMENT OF RURAL POST AND TELE-COMMUNICATIONS

	<u>1952</u>	<u>1953</u>	<u>1954</u>	<u>1955</u>	<u>1956</u>	<u>1957</u>	<u>1958</u>
Postal routes in the country- side (thousand km.)	1,044	1,237	1,324	1,424	1,414	1,795	2,574
Percentage of towns and town- ships having postal service in relation to total number of towns and townships	59.0	65.1	75.2	78.2	96.1	99.0	100.0*
Percentage of town and town- ships having telephones to the total num- ber of towns and townships	9.4	13.0	14.9	19.3	62.0	69.3	97.7*

*Figures marked with an asterisk refer to people's communes.

DEVELOPMENT OF TRANSPORT AND POSTAL COMMUNICATIONS IN NATIONAL MINORITY AREAS

	<u>Length of railways open to traffic (kilometres)</u>	<u>Length of highways open to traffic (kilometres)</u>	<u>Length of postal routes (kilometres)</u>
1949	3,511	11,430	61,686
1952	3,787	25,648	131,262
1957	5,486	65,408	397,219
1958	6,353	94,879	549,204
(1949=100)			
1958	180.9	830.1	890.3