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XC 74 RAIL NEWS  
No. 10  
January, 1959

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37 Naye Paise

# Southrailnews

PUBLISHED BY THE SOUTHERN RAILWAY

JANUARY 1959

No. 10

Please help to eliminate Beggars and Hawkers from Trains.

Elimination of Beggars and unauthorized Hawkers from Trains will make travel more comfortable and SAFER. Railways are doing everything possible in this direction. But complete success cannot be achieved without the whole-hearted co-operation of the traveller. Giving alms to Beggars and buying from unauthorized Hawkers on trains is the surest way of encouraging them. Apart from inconvenience, there is a danger that the things sold by the Hawkers are spurious.

Assist Railways to stamp out Beggars and unauthorized Hawkers from Trains.

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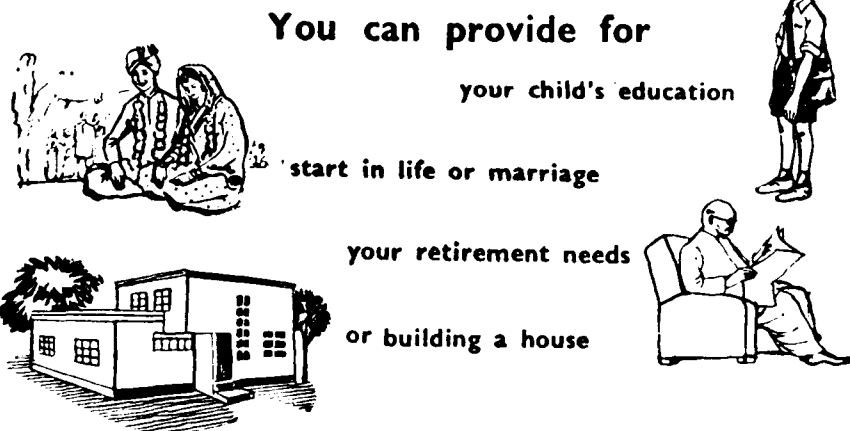
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DA 58/344

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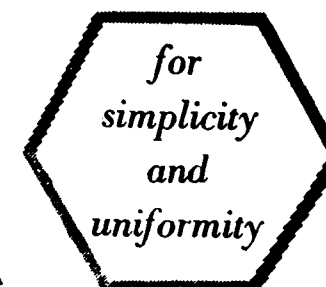
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|                                                       |      |     | Kilogram             | Gram | Kilogram                | Gram | Gram |   |
| 50                                                    | 5    | 500 | 20                   | 5    | 1                       | 500  | 50   | 5 |
| 20                                                    | 2    | 200 | 10                   | 2    |                         | 200  | 20   | 2 |
| 10                                                    | 1    | 100 |                      |      |                         | 100  | 10   | 1 |
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# METRIC SYSTEM

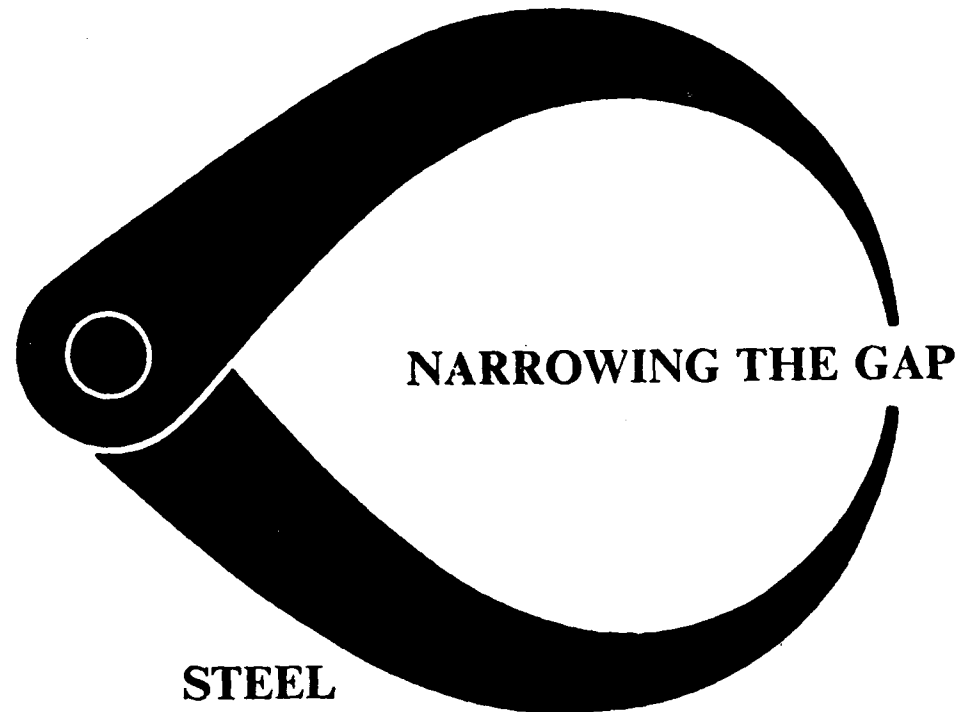
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DA 58/320

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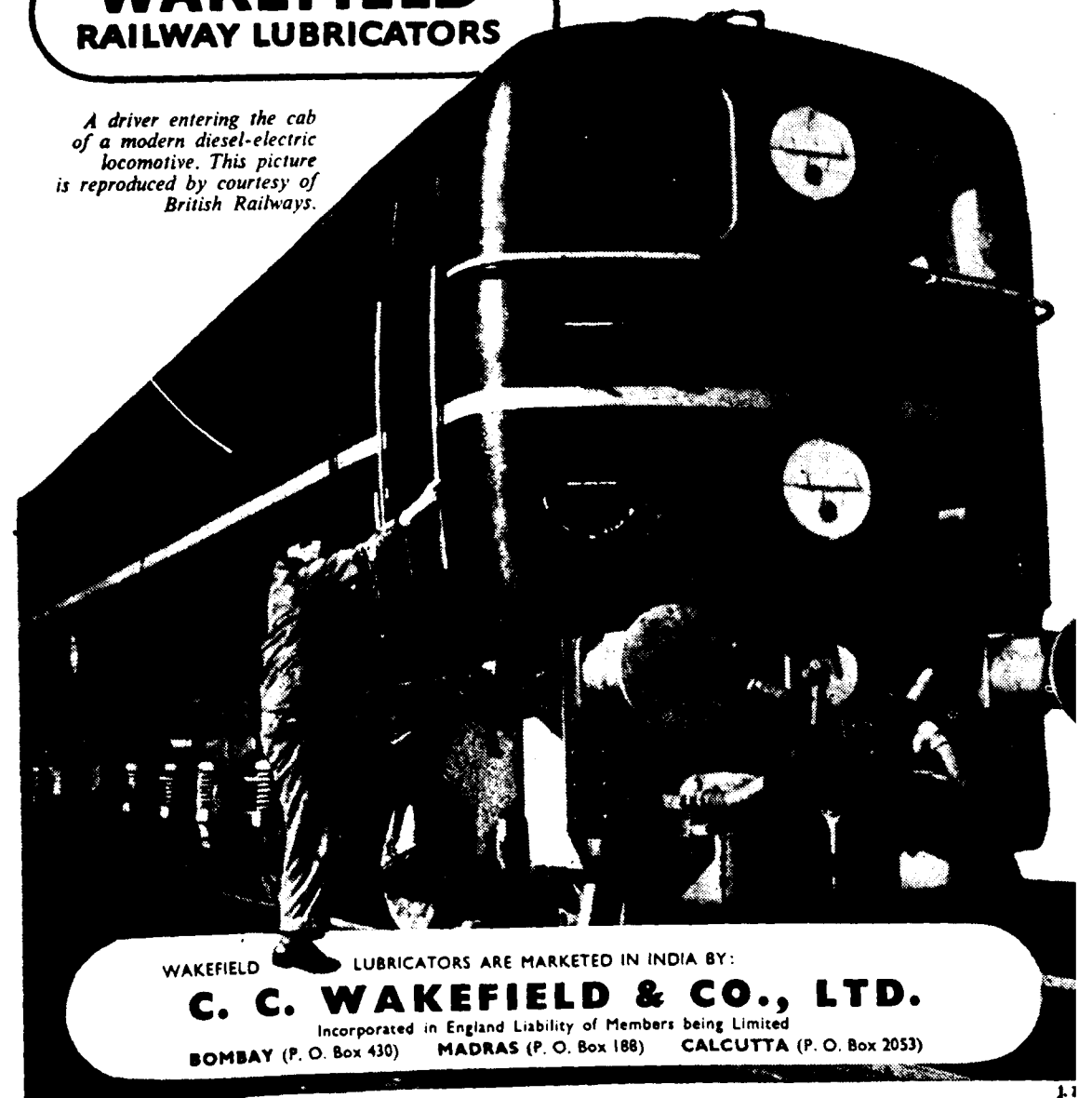
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# SOUTHRAILNEWS

(Published by the Southern Railway)

VOL. V

EDITORIAL NOTICE

No. 10

K. SRINIVASAN, Editor

All contributions must be clearly typed and double-spaced on one side of the paper only, and signed, not necessarily for publication but as a guarantee of good faith.

Manuscripts and photographs, not accepted for publication, will be returned only if the sender so requires and encloses the usual stamped, addressed envelope.

Contributions should be addressed to the Editor, not by name, and reach him not later than the 10th of the previous month.

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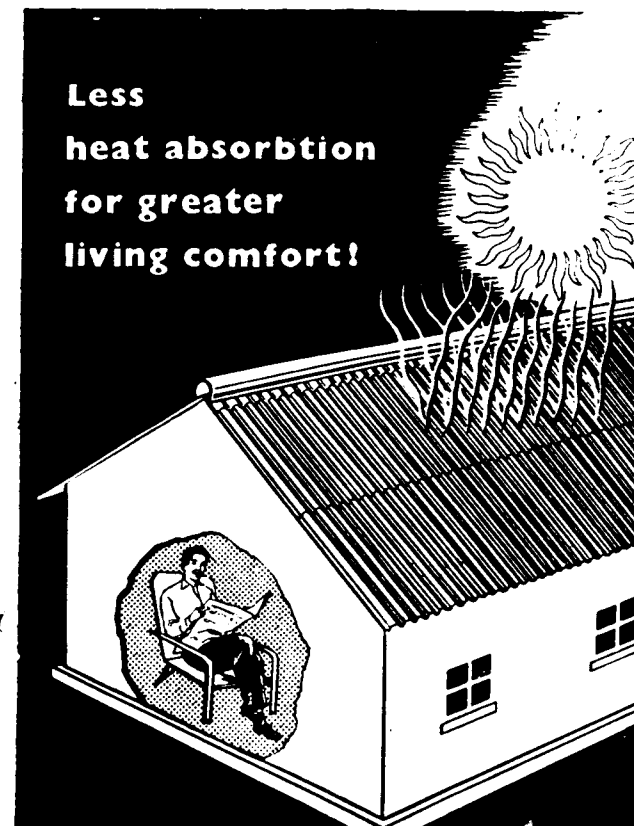


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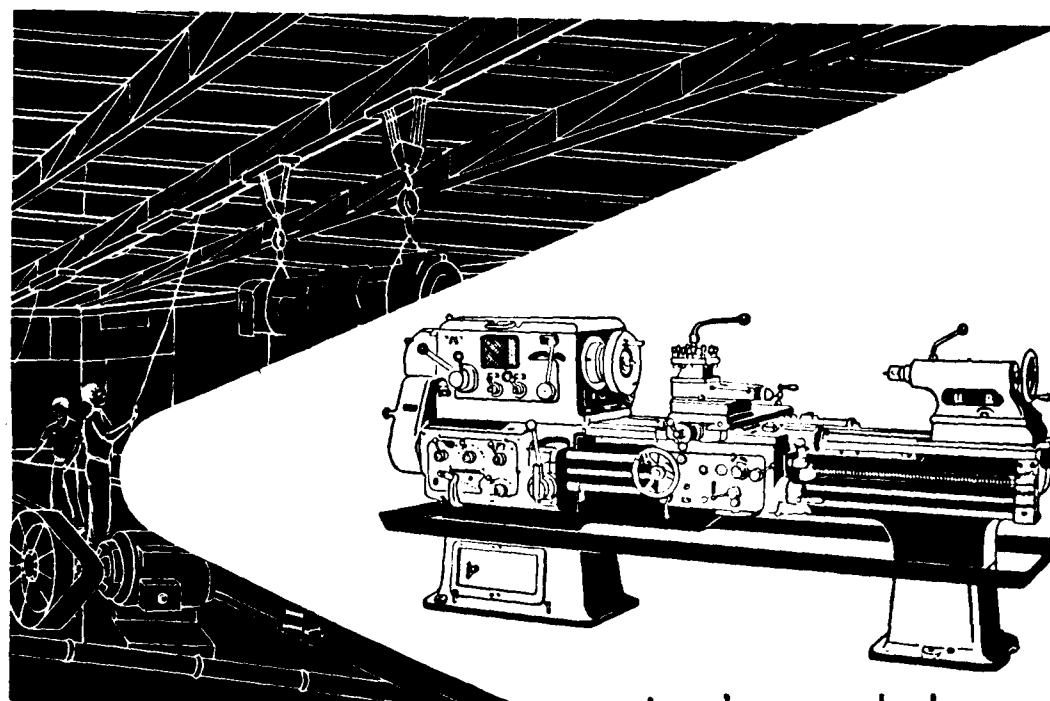
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# SOUTHRAILNEWS

VOL. V

JANUARY 1959

No. 10

## INDIAN RAILWAYS' PERSPECTIVE PLAN FOR RAILWAY FUEL

**S**TEAM locomotive is not an economic user of coal the best qualities of coal are no longer available for locomotive use; it stands idle where the fire is prepared and cleaned; and there is increasing difficulty in recruiting labour for manning and maintaining steam locomotive.

On the other hand, electric traction offers exact predictability of operation: single manning or a shorter runs; more comfortable driving conditions; absence of smoke; no use of fuel while standing and immediate readiness for service; multiple-unit working, permitting power to be proportioned to load; and a considerable increase in power output per ton of engine weight, etc. Diesel traction has similar advantages. Both electric and diesel traction have the drawback of high cost of equipment.

By resorting to electricity as a motive power for trains, it is argued, that the Railway which gets coal at comparatively high price can not only save in coal bill but also increase its existing carrying capacity without improved methods and carrying out additional works. Moreover, the expenditure on coal has risen out of proportion with the increase in traffic and the load in the recent years.

In 1956-57, the coal supplied to Indian Railways was inferior in quality and the consumption of coal on Indian Railways increased from 10 to 11 per cent of their fuel bill. The inferior quality of coal supplied to the Railways was responsible for this increase in the fuel bill.

In 1957, the Government of India appointed a Committee to enquire into matters such as the inferior quality of coal supplied to the railways and the increase in the fuel consumption and cost and to recommend measures to combat these increases. The Committee was under the Chairmanship of Mr. Karnail Singh, Member Engineering, Railway Board, and its members were Mr. Ratan Lall, Director, Transportation, Railway Board; Dr. J. W. Whitaker, Officer on Special Duty, Mining Research, Council of Scientific and Industrial Research; Mr. P. M. Nayak, Indian Civil Service, Coal Controller; Dr. A. Lahiri, Director, Central Fuel Research Institute; and Mr. D. P. Mathur, Member-Secretary.

It was noticed that the coal came from a large number of collieries and hence it was almost impossible to check the quality. On these grounds, the Committee recommended that the

Railways may be allowed to select the collieries to supply them coal and also to set up their own organisation to prevent the loading of inferior coal at pit-heads and to deal with collieries direct and take action against the collieries for supplying inferior coals.

The Committee found that the pit-head-plus-freight cost of coal was Rs. 44.2 crores or nearly five times the cost in 1926-27. Consumption closely followed the volume of traffic from 1926-27 to 1940-41, but then increased at more rapid rate until 1947-48, after which year it steadied and became proportional to the traffic until 1952-53. Since 1953, it has shown a gradual improvement though the traffic increased by 27 per cent from 1952-53 to 1956-57, the consumption rose by only 19.5 per cent due to better utilisation. Due to rises in pit-head prices and freights, however, the corresponding increase in cost went up by 37.7 per cent, or by all but Rs. 12.1 crores during these five years, nearly half of this figure being due to increase in pit-head and carriage costs, and the remainder to the greater volume of traffic. It was visualised that by the end of the Third Five-Year Plan, i.e., 1965-66, railway requirements would be about 26 million tons, practically double the actual figure in 1956-57.

The Committee has recommended a series of steps to prevent and to restrict consumption to a maximum of 26 million tons. The Committee has also visualised that there is likely to be serious shortage of high-grade coals for railway consumption and further deterioration thereafter. To meet this situation washing of inferior varieties

has been recommended. The Central Fuel Research Institute has put up proposals for necessary washeries for railways. In spite of the present fuel consumption trends being favourable, the Committee basing its recommendation on perspective planning, has suggested improved methods of estimating consumption, the strengthening of security forces at and the provision of enclosures round running sheds and strong disciplinary action against staff indulging in malpractices. Better methods of lighting engine fire and using the coal and maintenance have also been recommended. In this connection, there is a reference to departmental labour for handling of coal and ashes at sheds where coal pilferage is considerable. The Committee has gone a step ahead and recommended to curb the rise in coal consumption and cost by progressive replacement of steam haulage by diesel and electric traction. Taking a long run view of the question, the Committee has visualised that by 1975 only about 50 per cent of railway transport should be steam and that of the other 50 per cent—30 per cent may be electric and 20 per cent diesel. Keeping these things in view, the Committee recommended that high priority should be given to the indigenous design and manufacture of diesel plant and equipment and to increased production of diesel fuel and lubricants.

On the electrification side the Committee is of opinion that development of adequate capacity for the manufacture of heavy electric machinery and traction equipment within the country is imperative. This will be incidentally another step in self-sufficiency. Just as in transport, there

is need for co-ordination between the various means of transport such as air-way, water-way, road-way and the railway, one is remained of the necessity for co-ordination in planning of power development, transmission and power and sub-station for the supply of both railways and other industries.



it does not matter  
if we win or lose  
so long as  
tea  is there  
to cheer us up!



I am Tea

I serve  
those who play  
and those who watch

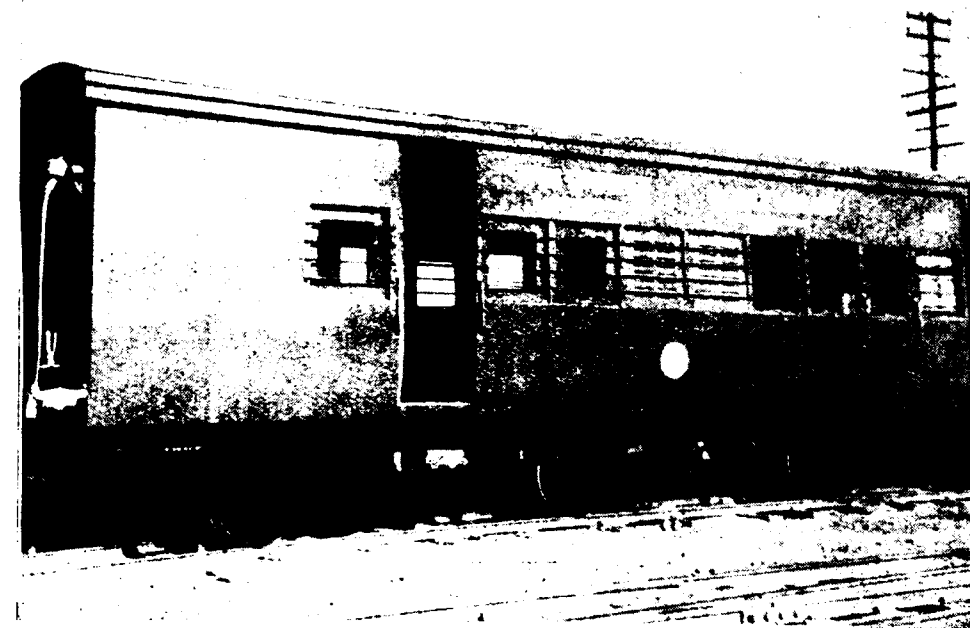


PST 201





Dr. KWAME NKUMAH, LL.D., M.P., PRIME MINISTER OF GHANA, WHO VISITED INDIA RECENTLY. BELOW: MARCH 6, 1957, INDEPENDENCE DAY FOR GHANA AND H. R. H. THE DUCHESS OF KENT, REPRESENTING QUEEN ELIZABETH II, PRESIDES AT THE FIRST SESSION OF THE FIRST PARLIAMENT OF GHANA DURING WHICH THE TRANSFER OF POWER FROM THE GOVERNMENT OF THE UNITED KINGDOM TO THE GOVERNMENT OF GHANA WAS ACCOMPLISHED



An exterior view of the mobile library for railwaymen

The Railway Minister, Sri Jagjivan Ram addressing a Conference of Chief Security Officers of Indian Railways in New Delhi, on January 17, 1959



# SOUTHERN RAILWAY

## TENDER NOTICE

### Madras Division

TENDERS FOR (1) **Basin Bridge—Washermenpet Vyasarpady Section :**

Complete track renewals—(4.7 Miles)  
Supply and training of stone ballast.

(2) **In and around Madras Area :**

Complete track renewals—(6.5 Miles)  
Supply and training of stone ballast.

The Divisional Superintendent, Southern Railway, Madras Division, Rayapuram, Madras-13, invites separate sealed tenders for the above to reach him not later than 15 hours on 16-2-1959. The total approximate value of the contract and the earnest money to be paid in each case is furnished below :—

|          |    | Total approximate<br>value of the<br>contract | Earnest money<br>to be paid |
|----------|----|-----------------------------------------------|-----------------------------|
|          |    | Rs.                                           | Rs.                         |
| Item (1) | .. | 1,20,000                                      | 3,000                       |
| Item (2) | .. | 1,44,000                                      | 3,600                       |

The cost of tender form for each is Rs. 10 (Rupees Ten only) which is not refundable. Last date for sale of tender forms is 15 hours on 12-2-1959. The earnest money should be paid to the Divisional Paymaster, Southern Railway, Rayapuram, Madras-13, before 12 hours on 13-2-1959.

Other particulars can be had at the office of the Divisional Superintendent, Works Branch, Madras Division, Southern Railway, Rayapuram, Madras-13.



*The Aerotrains, with tubular design, automatic-couplers, top-wheel axles, under-carriage baggage compartments, etc., offered to train passengers in the U.S.A.*

## BETTER PASSENGER SERVICE IS U.S. RAILROAD'S ANSWER TO JET AVIATION CHALLENGE

THE jet airliner has opened a new era of aviation in the United States with its ability to move passengers great distances at incredibly fast speeds. For those in a hurry to "get there" quickly, the new jet airliners are a welcome new means of fast travel.

A significantly large number of people, however, still prefer to travel more leisurely, to enjoy scenery as they go. This group—millions of them each year—demand comfortable, even luxurious accommodations, and they look to the railroads for this type of service.

Most noticeable developments in passenger service has been the rapid introduction of the low-slung, lightweight, speedy passenger trains. These trains consisting, for example, of a two-diesel locomotive, nine passenger cars, diner, mail and baggage car have cost in the neighbourhood of \$ 2,500,000 each.

Many of these new passenger trains feature "dome cars" or observation "bubbles," which permit an unobstructed view of the passing scenery. These have been unusually popular with travellers, especially in mountainous and other scenic regions. A

recent refinement has been the addition of floodlights on top of the cars to light up the countryside at night for passengers.

Most dome cars have special tinted glass which absorbs light and sun rays, thus reducing glare and heat and making use of the cars still more enjoyable. Many cars are equipped now with speedometers to tell passengers how fast the train is moving—a feature that has great appeal for young and old alike.

Still another important landmark in American railroading has been the introduction and wide use of diesel engines that now perform 92 per cent of all passenger train car-miles. To the passenger, the new engines have meant smoother starts and cleaner, cinderless accommodations, higher sustained road speeds, closer adherence to

schedules and greater all-around reliability of rail service. About \$600 million has been spent for these new power units, and some 2,500 such passenger units have gone into service since 1946.

Still other features of the new equipment include tight-lock couplers which provide smoother stops and starts; rubber insulation which serves as a buffer against transmission of noise and vibration; fluorescent lighting; circulating ice water which is pumped to rooms on trains; double panes of glass to prevent fogging of windows; rooms having radio service; public address systems for announcing information of interest to passengers such as dining car service; and telephone service to and from trains while moving. Many trains now feature the services of a stewardess, hostess, nurse or train secretary.

New automatic "Ticketeer" machines in the New York Central's Grand Central Station, which permits very speedy selling of tickets



Another recent innovation is the use of all-plastic interiors for dining cars. By using pastel color textures, a new richness in interior finishes has been found. In addition to a more pleasing eye effect, the new plastics deflect and absorb sound, making the cars quieter.

Ticket purchasing too has been made easier by a new system of applying electronic principles to the handling of ticket reservations. A number of railroads have revised and reorganized their methods of issuing tickets by machine as well as manually.

Then too, there has been put into effect on 47 railroads, a new nationwide system of rail travel credit cards. So popular is this new credit plan, that to date more than 250,000 of these cards have been issued to individuals and business companies.

Pullman (luxury coach) accommodations have received special attention. A typical "roomette," for example, now offers the traveller a completely enclosed room with more than ample space for one person. It is equipped with a pre-made bed, which folds into a wall and is over six feet long; a comfortable sofa seat; complete toilet facilities and individual controls for heat, lights and air-conditioning.

The post-war modern coach is noted for its spaciousness. Fewer seats in each car allow more space for stretching one's legs, for larger washrooms and lavatories, and in some cars, for a separate smoking section. The railroads have stressed deep, reclining seats with comfortable upholstery and footrests that make the seat practically into a bed when tilted backward.

On every road, the clickety-clack of the rails is fading away. Much



Search-lights on tops of trains light up landscapes and make night travel more enjoyable

of the future track will be made of welded steel in quarter-mile lengths for a quieter, smoother ride. What is more, there will be less of it. Automatic, electronically controlled systems, now make it possible to control traffic on a *single* track between cities. The New York Central Railroad, for example, has abandoned its four-track mainline and needs only two tracks. Using pushbuttons which activate electronically controlled switches, dispatchers seated before light-studded control panels now send passenger trains hurtling east and west at 80 miles per hour *on the same track*, switching one to a passing track when necessary.

Everywhere the once familiar "gandy dancer" (track worker) is

giving way to mechanization. In his place, a machine pulls and drive spikes better, tamps ballast and raises and lowers track automatically.

On railroad drafting boards are still newer improvements to make passenger service more attractive and enjoyable. Scientists are looking forward to an atomic-powered locomotive and have already placed in service an atomic signal lamp that will stay bright for at least 12 years by using radio-active isotopes. A plastic train wheel,

stronger and harder than steel, will cut noise and vibration to a negligible amount.

Rail officials do not foresee the time when their passenger trains will travel at jet airplane speeds of 500 miles per hour. But for their passengers who are willing to settle for a fifth of that speed, they offer hopes of rail travel that will be commodious, comfortable, virtually noiseless and without vibration—in all kinds of weather.



The east gopuram on the sea-shore



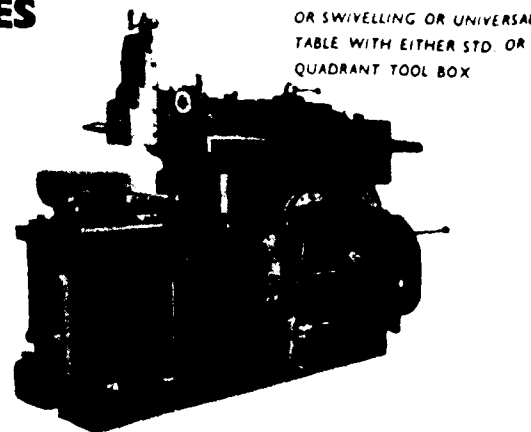
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## TIRUCHENDUR

T. N. SRINIVASAN

THE picturesquely situated temple of Sri Subramanyaswami at Tiruchendur is one of the lovely and at the same time sanctified spots dedicated to this deity, much venerated and adored by every devout Hindu. Situated on the sandy foreshore of the *Ratnakaram* the ancient name of the present Bay of Bengal—the eastern walls of this temple are laved by the foaming waves of the sea, but yet had stood firm all these ages.

Tiruchendur is connected by a branch line of the Southern Railway and is south of Tirunelveli, about 38 miles distant and about 445 miles away from Madras. The temple is

easily reached by rail and there are many choultries, where free accommodation is available, in addition to a finely-situated Travellers' Bungalow overlooking the sea, which meets the needs of the more sophisticated.

As one of the six famous and holy spots held particularly important among the numerous places dedicated to Sri Subramanya as described in the ancient *Thirumurukatrappada*, Tiruchendur occupies the second place, the other five being Palani, Tirupparankundram, Tiruttani, Swamimalai, Alagar-koil and Kathirkamam in Ceylon. Though ordinarily the shrines of Subramanya are situated on mountains,

this particular shrine is specially situated on the seashore. The significance of this peculiar situation is attributed to the genesis of this shrine.

*Skandapuranam*, one of the reputed eighteen puranams, gives a complete account of this spot and the reason for Subramanya choosing this spot for His abode. At one time the gods were much harassed by the demons (the asuras) who were led by Surapadma and his brothers. So the gods appealed to Lord Siva for help and in answer to their prayers, the Lord caused six sparks of fire to emanate from His frontal—the third-eye. These divine sparks of blinding brilliance and intense heat were received by Agni, the god of fire, who, himself being unable to bear the heat of the sparks, dropped them into Ganges river, from where it passed down to the Himalayan lake, *Saravanai*. Here these sparks were transformed into six charming babes who were suckled by the six *krithika* nymphs of the constellation Pleiades. These babes were then brought to Parvathi, the consort of Siva, who, taking a parental affection of these children created by her divine husband, embraced them all so closely that the six babes fused together into one body with six faces and twelve hands, becoming *Shunmuga*. Because of the enchanting beauty of the child thus created, he was called Muruga.

The gods appealed to this newly-born valiant youth about their troubles and Muruga went as the Warlord, commissioned by the gods and then came to be known as *Kartikeya*. He came down to the south and at Tiruchendur he camped with his army before attacking the asura leaders.

He desired then to worship His divine father and so the divine architect-Mayan (Visvakarma) constructed a shrine which still stands at the sea-front.

Kartikeya, the war god, after obtaining the blessings of His father and the other gods, led his army of devaganas against Surapadma. For five days, the asura army led by Surapadma, gave battle in all spheres—land, sea, air and underground. But failing to vanquish the army of Muruga, Surapadma single handed fought against the young warrior lord. To bring the war to an end Kartikeya took Indra in the form of a peacock as his *vahanam* and taking His divine lance (*Vel*) charged it at the demon. To avoid the onslaught, the dubious demon changed himself into a mango tree. But the lance thrown by Muruga pierced the tree, breaking it into two halves. Out of one flew out a mighty pea-fowl which attacked the peacock vehicle of Muruga. But the pea-fowl was soon vanquished and as per its prayers Muruga accepted it and took it as his permanent vehicle. From the other half emanated a chanticleer which was similarly subdued and accepted as the banner-emblem by Kartikeya, the *mayil* and the *seral*, which became famous in describing the attributes of Subramanya.

To have the much needed rest, this young warlord of the gods resolved to stay at the cool sea-shore at Tiruchendur and thus this place became a sacred Kshetram. The events leading to the success of Subramanya with its moral significance of the expiation of sin are observed as a festival in Tamilnad on the day of Skandasashti in the month of Aippasi. These episodes are vividly

described in the Sanskrit Skanda Puranam, which has now become extant. But a Tamil version of the same has been rendered by Kachiappa swami of Kancheepuram.

The origin of the famous temple at Tiruchendur, as is the case with almost everyone of the old temples here, is lost in the unrecorded mysterious past. The first shrine here must have been a rock-cut recess made in the red sandstone outcrop of rock that stands here as a natural phenomenon, which is referred to, in the ancient treatises, as the sacred *Gandhamadhana parvattham*. This forms the holy *sanctum sanctorum* of Sri Subramanya Shrine and the red parental sandstone rock has later been carved out to permit the construction of the three prakarams that now adorn this temple. Later the Pandya and the Chera rulers of this tract of land enriched the temple with numerous structural embellishments which we now see today. In the eighteenth century, Maharaja Marthanda Varma (1729-58) the maker of Travancore State, endowed the first kattalai known as the *Uthaya Marthanda Kattalai* with which the daily service of the Lord commences each day. However due to ravages of time and nature, the rocky wall of the temple and other structures were denuded and several parts of the old structures fell into decay. It was then that a noble mendicant, Sri Mauna Swamikal, started renovating the entire temple about a century later. He reconstructed almost the entire place using granite stones which could stand the weather better. It was in 1941 that the final Kumbhabhishekam of the Vimanam of Sri Subramanyaswami was performed which concluded the



Sri Subramania Swamy with Valli and Devayani

long spell of reconstruction of this temple. However the front *mela gopuram* was renewed later and today this ancient temple looks newer and grander.

The temple of Sri Subramanya here is situated about a mile from the Railway station and is connected by a gravelled road. Nearing the temple precincts the first shrine to be observed, is that of *Thondukkai Vinayagar*. Before reaching the *Vasanta mandapam* the worshipper passes along a granite-covered pathway with a overhead zinc sheet covering. Here stands the grand imposing *mela gopuram* of the temple. It is a massive

structure of nine storeys, standing as a distinct landmark for several miles around.

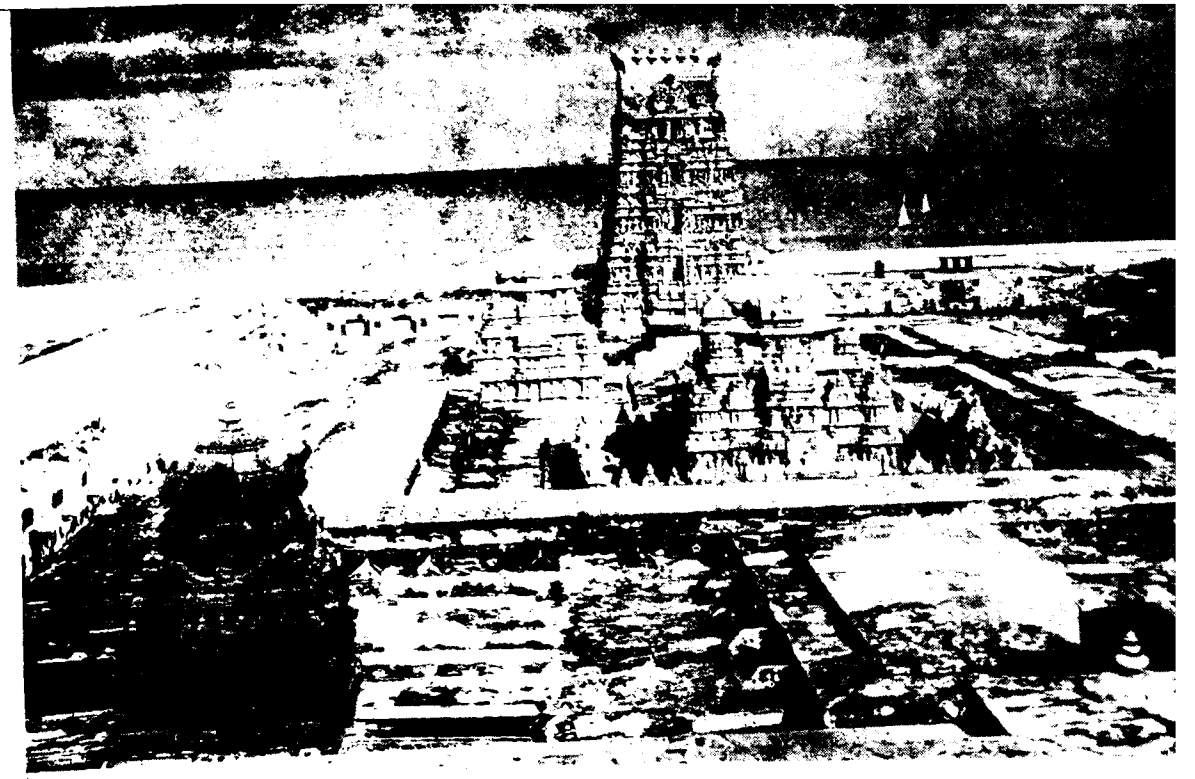
This elegantly constructed gopuram is about 140 feet in height, having nine sthupis on top. This gopuram is said to have been constructed about three hundred years ago by a Thamliran of the Thiruvavaduthurai mutt named Desigamurthy swami who was ordered by Lord Subramanya to take up this work. As a sanyasin he was without any material resources; but he ventured in this divine task relying on the Lord's command and help. The local tradition states that soon after the day's work was over, the swami used to give each of the workmen rinches of the sacred *vibhuthi*. When the workmen returned to their homes and opened out their palms it appeared that they had pure gold dust with them, the value of which was just equivalent to the day's wage which they used to get at some other places. With such mysterious background this gopuram was brought into existence.

Proceeding to the temple from the Devasthanam office premises the pathway leads to Gounder madam and a few steps off this is the Shanmugha Vilasam—One of the most magnificent mandapams in this temple in which the pillars, columns and plinths are worked in the characteristic Nayakan style of architecture. This mandapam runs north to south and at the southern end there is a passage which leads the pilgrim to the portal of the main shrine. Entering the first temple prakaram called the *Sivili mandapam*, one sees a continuous long corridor running right round the temple. In this prakaram are a number of cham-

bers containing the temple vahanams stores and other things. Here is also the shrine of Sri Dakshinamurthy. In the northern side of this prakaram is the famous Vishnu temple dedicated to Sri Venkatesa. This shrine is scooped out of the rock itself as the portion of the red sandstone forming the parent rock can be seen jetting out from within. Adjacent to Sri Venkatesa temple is another natural chamber in which the recumbent aspect of Vishnu as Ranganatha is depicted with His three consorts Sri Devi, Bhudevi and Neeladevi sitting by His side.

At the middle of this prakaram is the opening leading into the second prakaram of the temple which contains the dwajasthambam, shrines of Kumara Vitankar with his two consorts, Valli and Devayani, Chandeewara, Nataraja, Bhairava and Sri Saniswara. Passing inwards, the worshipper reaches the shrine of Sri Subramanya known locally as *Sri Chendil Andaran*. His shrine is guarded by Veerabahu and Veeramahendra. Inside the shrine the Lord is depicted in standing posture and the sublimity of the face is sure to enchant everyone. To his left is the small lingam called Sivalinga Jagannatha, who receives the daily poojas first.

As is usual with all ancient temples in South India, there are a number of thirthams or sacred bathing places here which find mention in the sthalapuranam of this temple. Here the sea itself is sanctified and a bath in it is said to confer great spiritual merits. But the most important theertham here which everyone makes it a point to visit is the reputed "*Nazhik-kinaru*." About two hundred yards



Panoramic view of the temple with the sea in the background

in front of the Shanmuga Vilasam stands this famous well which is a natural phenomenon. It lies practically embedded in the rolling sand dunes and is reached by a flight of about thirty-five steps. Actually here are two waters, for the water in the central well which is about a square of one foot each side, contains remarkably fresh crystal-clear spring water and the outer portion contains highly sulphurous saline water. The waters in each part swell up and get drained after being baled out for bathing purposes. However, there is a perennial supply of water in these two compartments all through the year.

A little away from the temple and on its northern side is situated a picturesque cave out of the overhanging cliff of sandstone. The front portion of this cave is embellished

with a stone mandapam. Images of Valli and Dattatreya are installed in this cave and consequently it is popularly known as *Valli's cave*. The sea-front curves out here giving a unique disposition to the cave while over the steep escarpment of sandstone, slender date-palms rise up into the azure sky.

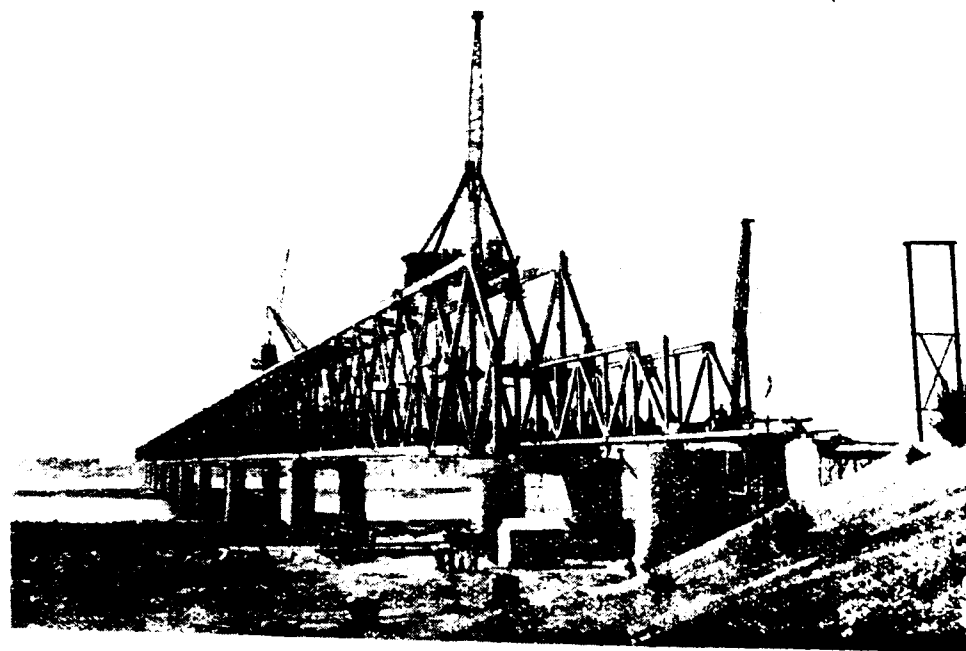
This temple at Tiruchendur is well endowed and so celebrates festivals throughout the year. Among them the most important are the two principal Brahmotsavams in the months of Avani and Masi each year. The other grand occasion is the Vasanta utsavam in the month of Chitrai which runs for two days. Equally important is the Vishakam festival of twelve days in Vaikasi and the Skandasashti festival in Aippasi. The last mentioned festival is of six days'

duration and on the last day the Tirukkalyana utsavam of Sri Subramanya with Devayanai is celebrated on a grand scale. It is customary for devotees of Lord Subramanya to fast for six days during this festival, reading all the while the sacred Skandapurana and then conclude the fast with a sumptuous feast.

Worshippers coming here can have darshan of Lord Subramanya from morning till midnight, since seven poojas are conducted daily here. The pilgrims are given a special kind of

prasadam called "Elai Veebhoodhi" (இலை விபூதி) in which the sacred Vibhuti is placed in a *panneer* leaf. Tiruchendur besides being a place of religious importance attracting pilgrims throughout the year is also a nice quiet seaside resort and thus a visit to this place is sure to benefit everyone. Moreover like the reputed *Kanyakumari*—the Cape Comorin, Tiruchendur is one of the extreme points in the tapering part of our great peninsula, where from the expanding sea-front offers an unique vision of the vastness of the Universe.

The fourteenth, and the last, main span of the Ganga Bridge Project has been erected. Photo shows the bridge with the newly completed span in the foreground



## INTERSTATE COMMERCE COMMISSION OF THE UNITED STATES OF AMERICA

[Concluded]

V. K. STHANUNATHAN, B.Sc. (Hons.)

Railway Staff College, Baroda

*Divisions of the Commission.*—The Commission is authorised by the Interstate Commerce Act to divide its membership by its own order into as many divisions consisting of not less than 3 members each as is considered necessary. The number of divisions and the assignments of members to divisions may be changed from time to time.

There are now 5 divisions of the Commission. Some Commissioners serve more than one division.

DIVISION 1—of which the Chairman of the Commission is a member of *ex officio* is known as the 'Administrative Division' and its jurisdiction covers matters pertaining to administration.

DIVISION 2—is known as the Rates, Valuation and Tariff Division. It has jurisdiction over rates and classifications, agreements of carriers, valuation matters, tariff publications, released rates applications, matters coming from the Bureau of informal cases, etc.

DIVISION 3—Safety Division. It has jurisdiction over matters concerning hauling of traffic, extensions and abandonments of lines, safety matters, matters relating to transportation of explosives and dangerous articles, subjects pertaining to boiler inspection Act, etc.

DIVISION 4—is the finance division and is responsible for matters concerning financial regulation of carriers,

loans to carriers, consolidation of railways, rail road control over water carriers, etc.

DIVISION 5—is the Motor Carriers Division and is concerned with Part II of the Interstate Commerce Act.

The Chairman of the Interstate Commerce Commission is selected by the Commission itself. The Chairman is the executive head of the Commission and is responsible for the efficient working of the Commission. He presides at all full meetings of the Commission. He also represents the Commission in all matters involving contracts with other agencies. It is usually the Chairman who appears before the Committees of the Congress or the Senate to give expression to the official views of the Commission on legislative and other matters.

Under the Act the commission by its order can assign any part of its work to individual commissioners or boards composed of employees of the commission for action. The individual commissioner or the board have authority to hear and decide matters assigned to them and have the same jurisdiction and powers as the commission itself. Their orders and decisions and reports have the same force and effect as if they have been made by the commission itself. Any party has, however, the right to appeal for reconsideration, or rehearing of the cases by the commission or a division of the Commission. Similarly action

by the respective divisions are subject to reconsideration by the Commission as a whole.

*Commission's Bureaus.*—In order to attend to the administrative work, the commission has created several bureaus. There are at present 15 such bureaus—

1. Administrative Bureau.
2. Accounts & Cost Finding bureau.
3. Finance Bureau.
4. Formal Cases Bureau.
5. Informal Cases Bureau.
6. Inquiry Bureau.
7. Law Bureau.
8. Locomotive Inspection Bureau.
9. Motor Carriers Bureau.
10. Bureau of Safety.
11. Transport, Economic & Statistical Bureau.
12. Traffic Bureau.
13. Valuation Bureau.
14. Water Carrier's Bureau.
15. Freight Forwarder's Bureau.

Each bureau reports through one of the Commissioners who is designated to be in-charge of the particular bureau. The reports are sent to the concerned division of the commission or to the commission as a whole.

*The Administrative Bureau* which is responsible for budgetary and personnel matters is headed by the secretary of the Commission.

*Bureau of Accounts*—administers matters pertaining to uniform accounts and consists of a division of accounts division of motor accounts, and division for cost finding.

*Bureau of Finance* consists of the finance section and accounting and statistical section.

*Bureau of Formal cases, Informal cases, Inquiry and Law* deal with complaints, inquiries and legal matters.

*Bureau of Formal Cases* consists of a Chief Examiner and a staff of examiners. The examiners administer all oaths, examine witnesses and receive evidence in hearing before the commission.

*The Bureau of Informal Cases* deals with informal cases.

*The Bureau of Inquiry* is responsible for the enforcement of the provision of the Interstate Commerce Act involving criminal prosecutions.

*The Bureau of Law* is under the Chief Counsel of the Commission. This bureau advises the commission in all legal questions and represents the commission before the courts in cases which go to the courts.

*The Bureau of Locomotive Inspection*, its jurisdiction covers boiler inspections, etc., pertaining to railway locomotives.

*The Bureau of Motor Carriers* deals with matters pertaining to motor carriers pertaining to administration of safety appliances, etc.

*The Bureau of Safety* is responsible for the administration of safety appliances and train control, etc. There are sections for safety appliances accident investigation and signalling and train control.

*The Bureau of Transport, economics and statistics* compiles data including

the growth, technical condition and financial position of the carriers. It has several sections for analysis, for operating, returns, mechanical tabulations, etc.

*The Bureau of Traffic* is one of the most important bureaus which has jurisdiction over matters bearing on transportation charges.

*The Bureau of Valuation* is responsible for evaluating the property of carriers as required by the Act.

*The Bureau of water carriers and Freight Forwarders* deal with tariff matters and finance matters of freight forwarders and motor carriers.

In addition to the central organisation in Washington, the commission also maintains a large and scattered field organisation under each of the bureaus. The members of the commission are also divided into a number of committees. There are at present 11 committees for the following matters.

- (1) Salaries of Personnel.
- (2) Rules.
- (3) Reports.
- (4) Reporting.
- (5) Legislation.
- (6) Finance.
- (7) Annual Report.
- (8) Co-operation with State Commissions.
- (9) Organisation.
- (10) Admission to practice.
- (11) Building and assigning of space.

The Interstate Commerce Commission has published its own rules of practice for the guidance of those who

have to approach the commission in some capacity or other either in person, by counsel or by correspondence.

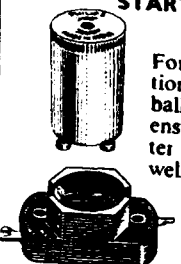
The commission has many proceedings arising out of controversies between shippers and railways or other carriers and between carriers. There are also matters which are brought for their decision which might not have an element of controversy. The commission can conduct proceedings either on complaints or its own initiative. As mentioned earlier the commission performs quasi-Judicial functions, quasi-administrative functions and quasi legislative functions. Though the commission resembles very much courts in some respects it is not a court.

One important aspect of the rules and practice before the commission is that it has endeavoured to establish a system that would permit the conduct of business expeditiously and at the same time carefully preserve the rights and privileges of all interested parties. Its rules are, therefore, much more flexible than those followed by law courts. For example there is a system of procedure under which many controversies can be settled without formal hearing what is known as the Informal Procedure. Even in cases where there is a formal hearing rules permit of a procedure known as the "Shortened Procedure." The commission has consistently tried to conduct its business in such a manner as to involve the least expenditure of money and time to those who come to the commission for redress.

The right to represent before the Interstate Commerce Commission is not restricted to lawyers. The commission has, however, laid down that the

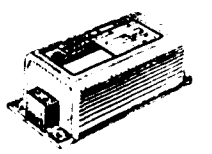
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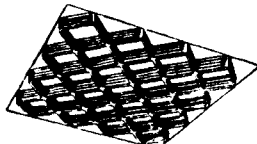
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right to practice before the commission will be conferred only on persons who have proper qualifications. It maintains a register of practitioners in which are maintained the names of persons entitled to practice before it. There are two classes of practitioners—

- (1) Attorneys-at-Law.
- (2) Persons not attorneys-at-law but who are citizens of the United States and have satisfied the commission that they have necessary qualifications.

A qualifying examination is conducted to test the applicant's knowledge in the following matters:—

- (1) The structure and history of the Interstate Commerce Commission.
- (2) The Interstate Commerce Act and related acts, rules and practices of the Interstate Commerce Commission.
- (3) General rule of evidence.
- (4) Leading cases involving Interstate Commerce Act and their significance.

The commission reserves the right to deny admission to persons not properly qualified and to suspend or debar any practitioner.

We shall now see some of the procedures before the commission which tend towards expeditious disposal of business.

*Informal Procedure before the Commission.*—In order to relieve the burden of formal case procedure wherever possible and practicable, and in order to reduce the expenses of litigation, the commission permits through its

rules of practice, complaints to be filed on what is known as the "Informal Docket."

An Informal complaint is a complaint or information filed against any carrier in writing. No particular forms are prescribed but the letter must contain essential elements of the complaint *i.e.*, it must show that the complainant has suffered or injured as a result of some act of omission or commission by the railway subject to the Interstate Commerce Act, and it must also indicate which provision or provisions of the Act are violated.

Informal complaints that are received by the Interstate Commerce Commission are dealt with in the commission's bureau of Informal complaints. The bureau examines the complaint and where the statements furnished are incomplete, the bureau gets further details from the complainant. The complaint is then transmitted by the bureau to the defendant to bring about mutually satisfactory adjustments, without the necessity of taking recourse to formal procedure before the commission. The defendants are not obliged to settle the complaints on the informal dockets. They may always insist on the right to formal hearing before the commission; but if they are agreeable to the informal procedure the carriers are requested to state their facts or the position taken up by them in regard to the complaint. The bureau arranges for further particulars being obtained from the carriers if their answers do not fully clarify the position on particular points. The carriers may refute the allegations made, or may indicate a particular act of omission does not constitute violation of the Interstate

Commerce Act, or may indicate their willingness to cease or desist from such action or they may say that formal procedure should be resorted to.

After answers are received from the railway in the bureau of informal cases, the bureau examines the answers. If the carrier refuses to accede to the prayers of the complainant and the bureau believes that the refusal is justified in view of the facts and according to law, it may forward the carrier's answer to the complainant with their own comments that the carrier's stand is justified. If however the bureau believes that the complaints are justified under the circumstances it may advise the complainant accordingly. The opinions of the bureau on the merits of the complaint, are only *prima facie* opinions.

If the carriers are willing to make settlements with the complainant, the matter is referred to the special docket section of the bureau of informal cases of the commission for appropriate action leading up to a final order of the commission. In cases where the carriers refuse to settle the matters in the controversy on the informal docket, the bureau of informal cases advises the complainant accordingly.

After receiving the answers from the carriers the complainant may decide his further course of action if he is not satisfied with the answers given by the carriers. He may either abandon the complaint or file a formal complaint with the commission or seek other legal remedy that is possible under the Law.

In all cases, proceedings conducted on the informal docket are without prejudice to the complainant's right to

prefer formal complaints even during the pendency of an informal complaint.

*Shortened Procedure before the Commission.*—The rules of practice of the Interstate Commerce Commission provide in addition to informal procedure another mode of procedure which is shorter and less expensive than formal procedure. There are hundreds of formal cases before the commission and the shortened procedure enables more expeditious settlement of complaints and reduces the expenses of litigation.

In the shortened procedure sworn statements of facts of the litigating parties are taken instead of a regular hearing before the examiner or commissioner.

The pleadings in the cases under this procedure also are the same as in regular formal procedure. The formal complaint in the prescribed form is first filed with the commission. As soon as possible after the service of the complaint, the commission may suggest that the proceedings may be conducted under the shortened procedure. This suggestion may be made either in its own initiative or on approval of a request made by either parties. The shortened procedure is resorted to only with the consent of all the parties concerned.

After all the parties to the proceedings have consented to the use of shortened procedure, the complainants are required to submit to the commission the following memoranda:—

(1) Memorandum of the facts deemed pertinent to the cases.

(2) Memorandum of the argument on which the complainants rely to establish their cases.

These memoranda must be filed within 20 days from the date the commission notifies that the cases will be conducted under shortened procedure. The defendants are required to serve on the complaints or their representatives necessary memoranda within 30 days after the service of the complainant's memoranda. Memoranda filed by the defendants should consist of—

(1) An answer memorandum of the facts relied by the defendant in the case.

(2) Answer arguments memorandum stating the case of the defendants.

Copies of the memoranda should also be filed with the commission. If the defendant fails to file the answers within the time limit it will be assumed that they do not wish to submit any memorandum and the case is proceeded with just as if the answer is filed. After the answer memoranda are received, the complainant may serve within 15 days reply memoranda and copies of these will also be filed with the commission. The reply memoranda must be strictly confined to answers and to the facts and arguments set forth by the defendants in their answer memoranda.

Intervenors are permitted to file petition in the shortened procedure also just as in regular formal cases. Intervenors are required to file and serve memoranda in exactly the same way as required for complainants and defendants. The filing of the complainant's reply memoranda usually concludes the presentation of the evidence unless the commission specifically directs otherwise. The case to-

gether with all complainant's answers and reply memoranda is assigned to an attorney-examiner of the commission who prepares a "*proposed report*" on the case for the commission. Copies of the attorney-examiner's proposed reports are served on the parties concerned. Thereafter the proceedings are handled in the same manner as in the case of formal cases.

The cases may be assigned for oral hearings at any stage, of the proceedings prior to the service of the attorney-examiner's proposed reports on the request of any of the parties to the proceedings. The commission may also on its own motion at any stage of the proceedings assign the complaint for oral hearing.

The statements and answers have to be in the form of affidavits sworn by the persons concerned and they should, if called upon, be prepared to come as witnesses in the oral hearings.

*Formal Procedure before the Commission.*—The formal procedure also begins with a complaint by a party alleging violation of any of the provisions of the Interstate Commerce Act by a carrier. The rules of practice prescribe in detail the form in which such complaints should be prepared.

Defendants must submit answers to the complaint also in the manner prescribed by the rules of practice. Usually the answers must be filed within 20 days after the service of the complaint and the periods may be shortened or extended by the Commission in its discretion. After the complaints and answers have been made and other pleadings have been filed the commission arranges for hearing of the

cases either before the commission as a whole or before a single commissioner or one of the commission's examiners. Witnesses are examined orally under oath. Examination and cross-examination are conducted by opposing counsel before the commission, individual commissioner or examiner. Witnesses can be summoned up to appear before the commission by issuing subpoenas. Documentary evidence can also be filed in the form of exhibits. After the closing of the hearing parties may file briefs in the forms prescribed by the commission's rules of practice. The briefs are required to show the dates on the front cover or on title pages and abstract of the evidence arranged by subjects and reference to the pages of the record or exhibits where evidence appears. If the parties wish to have oral arguments before the presiding commissioner or examiner at close of the hearings, they are required to notify the presiding officer at or before the opening of the hearing. Arrangements will then be made to hear arguments. The oral arguments are stenographically transcribed and these are used, together with the testimony before the commission in considering the cases.

After the hearing is over the commissioner conducting the case prepares a proposed report containing—

- (a) A statement of the issues.
- (b) A statement of the facts in the case.
- (c) The findings and conclusions he thinks should be made by the commission.

Copies of the proposed reports are sent to the parties concerned.

Exceptions to the proposed reports may be filed with the commission by any party within 20 days after service of the proposed report. Exceptions to examiner's proposed reports must be specific both as to facts and matters of law. The examiner's proposed reports become the basis of the commissions' reports in the absence of any exception.

After the report of the presiding commissioner or examiner has been made and exceptions and arguments have been considered, the commission or a division of a commission or an individual commissioner to whom the matter has been assigned makes the report of the commission. The final report of the commission is made and reparation awards are ordered if found to be due.

Appeals on affirmative orders of the commission may be made by the parties affected to courts of competent jurisdiction. After the courts have made their decisions appeals may be taken to the higher courts of review and finally appeals may be taken to the United States Supreme Court if it chooses to review the cases on appropriate writs. We have already discussed the scope of judicial review of the orders and decisions of the Interstate Commerce Commission.

Orders of the Interstate Commerce Commission are enforced by the United States district attorneys under the direction of the Attorney-General of the United States.

The Chief Administrative Officer of the Commission is the Secretary of the Commission. He also signs the orders which the commission issues. The

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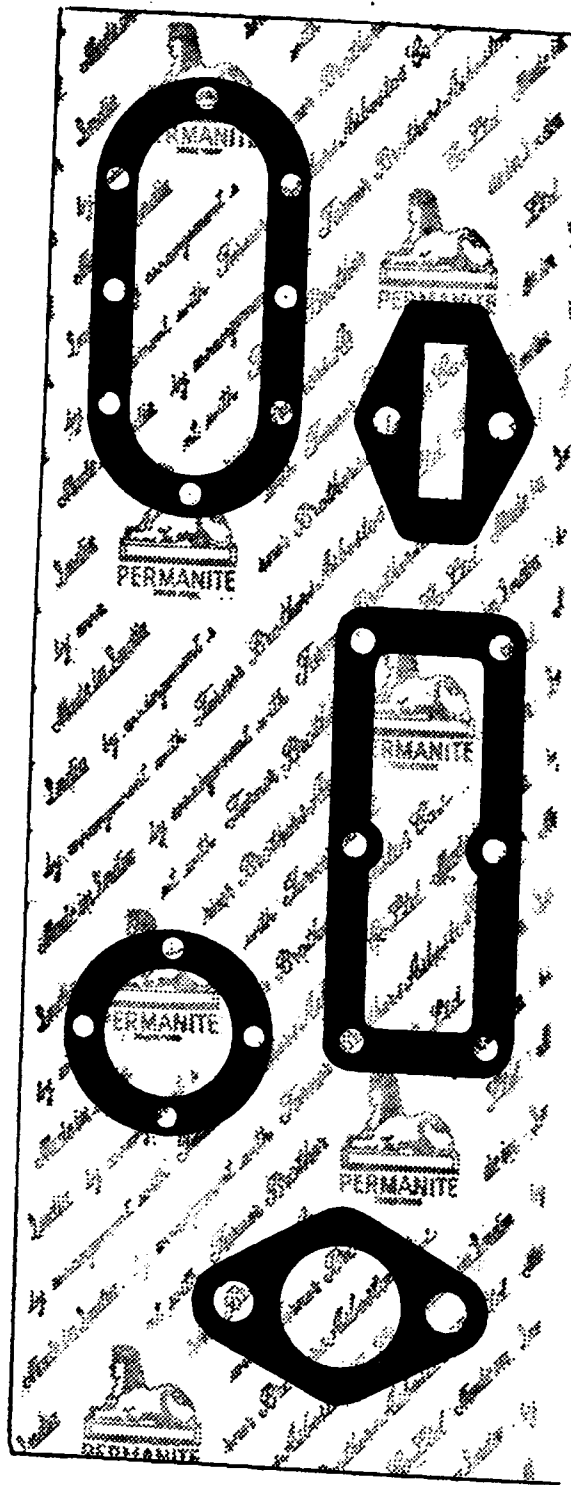
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reports and orders of the commission are first issued in mimeographed forms for service on all parties interested. All reports and orders are kept in the Secretary's office and are also available for inspection by the public. Secondly the more important reports are printed in the Government Printing Press and are available for sale from the Superintendent of Documents. They are issued later in bound volumes with the less important cases merely summarised.

The commission issues three series of reports of its decisions and orders: Interstate Commerce Commission reports dealing with the cases and investigations arising under Parts I, III and IV of the Interstate Commerce Act; the M.C.C. reports dealing with the cases arising under Part II of the Act (the Motor Vehicle Act) and the valuation reports. The first 21 volumes of the Valuation reports were included in the regular Interstate Commerce Commission reports but later volumes have been put in separate series. There are now nearly 300 volumes of the Interstate Commerce Commission reports and nearly 100 of the M.C.C. reports.

A digest of these Interstate Commerce Commission reports has also been published by the commission known as the Annotated Acts. There are about 16 volumes of the Annotated Acts. Under each Section of the Act there are detailed subject heading called notes: Under these notes, extracts from the original decisions are given quoting reference to the cases. The note headings and numberings are the same in all the volumes and this enables easy reference to case-law. The decisions of the Interstate

Commerce Commission are the main source of case-law in regard to all rates matters apart from the English decisions of the Railway and Canal Traffic Commission and the Rates Tribunal.

The Interstate Commerce Commission is regarded as a body second in importance only to the Supreme Court of the United States. The Commission has tried to remain a free and impartial body though the danger of political interference cannot altogether be ruled out. The President appoints the members of the Commission "with the advice and consent of the Senate". According to the Act not more than 6 members should belong to the same political party. Usually though the President appoints the members for political considerations the appointments have been of high quality. Although the President appoints the members of the Interstate Commerce Commission he does not have the power to remove them except for specified causes. During their term of office of 7 years members of the commission may be removed only for "inefficiency, neglect of duty or malfeasance in office". This ensures to a large extent the independence of the members. The high esteem with which the Interstate Commerce Commission is held in America is in a large measure due to its independence and freedom from political influences. A former member of the Commission described this in the following words:—

"The Commission has performed its duties in accord with its conscientious conviction of

(Continued on page 40)

## SHAKESPEARE'S PHILOSOPHY IN A RAILWAYMAN'S PHOTOGRAPHY

LAUGHING DIPLOMAT

*[The characters in this story are imaginary: wherever the title or office seems to suggest an individual, a characterization of the present incumbent has been avoided.]*

ONE Railwayman once wanted to purchase a photographic camera. This idea occurred to him when he was on leave at a hill station 7,400 ft. above sea level. He went and purchased a fairly cheap camera being his first attempt. He got an idea that though he had purchased one of the cheapest cameras, he must photograph the biggest and best object. [The first and the best but probably the last.] He dressed up smartly and was taking a stroll. An idea came to him that he should photograph the Government House, the biggest Government building and he went into the Government House passing through a gate which was guarded. The sentry thought that he was an important person as he was well dressed and was strutting majestically. This Railwayman went straight near the Government House. This happened to be during the Second World War, when anybody was suspected to be a spy, the spy of an enemy or a fifth columnist. In spite of this he got entry without being questioned due to the gusto with which he walked and being very well dressed. He did not know how to adjust his camera. A passer-by was coming, who was probably the staff of the big Government House establishment. From him he got his camera adjusted and went very near the building and took three or four

snapshots of the Government House. Meanwhile the daughter of the V.I.P. was watching from the upstairs of the building and suspected that the photographer was a German spy and the sentry took this guest photographer and asked him who he was. When he said he was a railwayman, the sentry wanted some proof. The proof adduced was still to be corroborated by some responsible or an important person. The Railwayman pointed out some important person in the bungalow below.

It was a good thing that at that time, he was lucky enough to think of that person whom he knew, who was enough to testify to his bonafides. Here one is reminded of Shakespeare's words in Julius Caesar, as expressed by a stoic philosopher.—"There is a tide in the affairs of men which taken at the flood leads on to fortune, omitted all the voyage of life is bound in shallows and in miseries on such a full sea of flood are we now afloat. We must take the current when it serves or lose our ventures." He took the current when it served him. He also took the fortune at its flood. He was lucky enough to think of the right person to guarantee his good conduct. When he was taken to that

(Continued on page 48)

# THOSE LITTLE EXTRAS

## OPRAIL

WHEN a passenger makes a rail journey he is afforded various facilities and amenities to make the journey as comfortable as possible. At stations railways provide such amenities as waiting rooms and waiting halls, lavatories, drinking water arrangements, bathing places, and catering or vending. Obviously, the scale of such amenities depends upon the volume of passenger traffic dealt with. But apart, from these, at the larger stations and junctions, where passenger traffic runs into several thousands a day, the little extras are made available. Supposing we took a stroll around one such big station to see what we can find.

We step into the spacious third class passenger hall. Looking around we see a number of stalls. For those who like to smoke there are stalls where cigarettes, tobacco and biris of all brands are for sale. These stalls cater for all types and tastes, and whether the purchaser is poor or well-off, he can always get what he wants.

Rail travel always seems to give an edge to the appetite, so if we want to have a substantial meal, we have a variety of foodstalls from which to make a choice, whether vegetarian or non-vegetarian. Bread and butter, eggs, biscuits, a cup or a pot of tea, or if it is a full meal, meat or vegetable curry, rice, chapatties, and various spices, are there for whoever wants to buy them. The men behind the counters take your order and within a few minutes the snack or the meal is ready for eating.

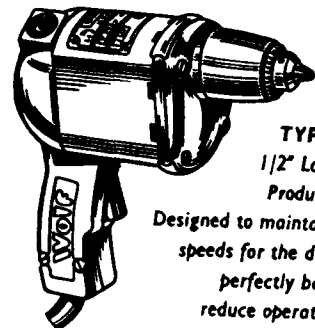
A familiar and comforting feature of the teastalls, is the large tea urn, from which a plume of smoke always seems to issue. For six naye paise a refreshing hot cup of tea is ready for drinking whenever wanted. For those who have a sweet tooth, the sweetmeat stalls provide a variety of nice things at moderate prices.

Next we see fruits of all kinds that happen to be in season—oranges, bananas, guavas, dried dates, pomegranates, apples, and of course the ubiquitous 'cheena badam'. The fruit stalls and vendors are always available to sell us the fruit of our fancies.

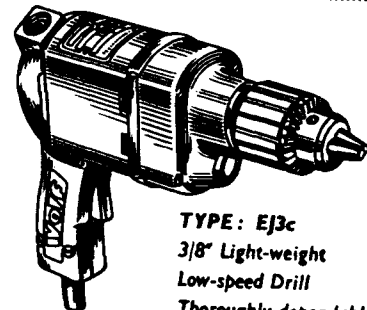
Looking around further, what do we see. Another stall that styles itself 'Stationery stall'. Apart from letter paper, ink, pencils, etc., other articles will be found on sale there, such as soap, bottles of hair cream and hair oil, shaving sticks, razors and blades and perhaps even handkerchiefs of assorted colours and sizes. A stall of this type serves a really useful purpose, especially for the forgetful traveller. He may have forgotten to pack his soap, or toothbrush or toothpaste and so on in his box, so when he reaches a big station where such articles are on sale within the station premises, and desires to have a wash and brush-up, he can buy what he needs instead of rushing off to a shop in the town.

Continuing our prowling around the station we find a few more surprises. A built-up shop of polished wood and glass show-cases which on close scrutiny reveals itself as being a flower shop. What, we may ask, is the use of a

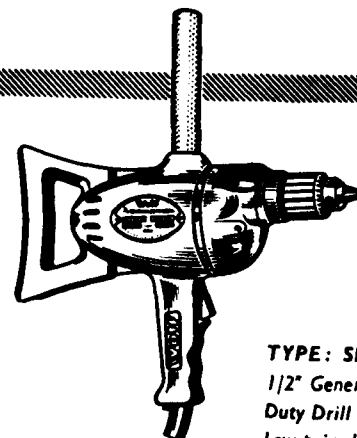
## A FINE PRODUCTION TEAM



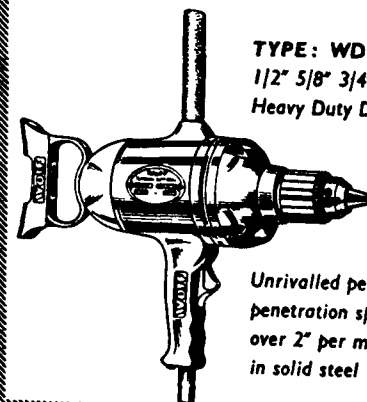
**TYPE: EG2c**  
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Production Drill  
Designed to maintain correct  
speeds for the drill bits—  
perfectly balanced to  
reduce operator fatigue



**TYPE: E13c**  
3/8" Light-weight  
Low-speed Drill  
Thoroughly dependable tool  
combining immense power  
and stamina with extra  
lightness and portability



**TYPE: SD4c**  
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flower shop on a railway station? The ordinary rail traveller would just rush past the flower stall without a glance. But there are the exceptions, the lovers of nature, the dandified folk, who love to pin a flower to the hair, or the lapel of a coat; or when some important person is to be met or seen off, or a lady to be presented with a bouquet, the flower stall is there to supply the single flower, the bunch or the garlands that may be needed.

In another part of the station concourse will be found a stall with the designation 'Hair-dressing Saloon'. Step inside this and we will find a hair-dressing establishment that can compete well enough with the better type in the nearby city or town. It has all the usual fixtures, fittings and tools of the trade, such as an array of large mirrors, bright lights, hair-clippers, scissors, razors, brushes, soap lather, etc. So whatever we may need in the shape of a hair-cut, shave, shampoo or scalp-massage, is there on the spot. The grooming can be completed by stepping outside the hair-dressing saloon calling up a shoe-

shine boy to give the shoes the final gloss.

The health authorities of big cities are always on the alert to keep down the ravages of epidemic diseases. So if a train journey is made during one or more phases of such epidemics as cholera, small-pox, etc., a complete health unit will be found available for the convenience of the travelling public. Here inoculation or vaccination is available at the expense of the Government.

On station platforms while waiting for a train to move out vendors will be seen moving up and down tempting passengers with all sorts of things for beguiling a railway journey like books, magazines, eatables, toys for the kids, hand fans for adding to the air circulated by compartment electric fans, perhaps some articles of clothing or footwear, or even penknives and ornaments to take away with you on the homeward trip.

It is perhaps these little extra amenities that give a tang of spice and variety to rail journeys which might otherwise be tiresome.



### Interstate Commerce Commission of the U.S.A.

(Continued from page 36)

what was the right thing to do and has not been swayed by popular clamour or by any political influence and if the time ever comes when the Interstate Commerce Commission has to consider

whether or not a thing is going to be popular, whether or not it is going to be attacked by one political party or another, its usefulness will be very seriously impaired."

## ENTERTAINMENT FOR 'SIX NAYE PAISE'

Miss S. MULLATH

SEEING off friends or relatives at a railway station has always been a matter of great pleasure to me. For one thing, I don't have to sweat over the gruelling ordeals of train travel myself. And then, there is the fun; all the different kinds of people you would most probably bump into or rub shoulders with, the routine racket kicked up by porters, vendors, and of course the impatient, worried passengers.

So it was not without the out-for-fun feeling that I went to Madras Central Station. 5 P.M. usually finds me tired and exhausted. But not that day. For I had to say good-bye to two friends each going by a different train, which meant I would have to spend not less than two hours at the Central. Funny isn't it? The very name Madras Central, suggests a busy and noisy atmosphere. At least, it does, to me. And this I must say about Central, it has provided me—and many like me, I am sure—many a pleasant evening. As I was saying, I was out for fun and decided to reach the station with plenty of time to spare. Being one of the many who have to depend on the city's bus transport system, which leaves plenty to be desired, I did not waste too much time on make-up. That does not mean I did not do justice to young womanhood. I certainly did. Surprisingly enough the bus was on time, and it managed to do the slightly-over-one-mile lap in exactly twenty-three and a half minutes. This was only possible by the kind co-operation of the conductor, who insisted on

issuing tickets to all while the bus was stationary, the extra cautious snail's-space driver and of course the overaged protesting engine of the bus. But as I said I had started with time to spare and when I got off the bus opposite Central, the clock on the tower told me I had 50 minutes at my disposal before the scheduled departure of my first train.

I reached the porch successfully dodging a taxi and a tonga which were very determined to run over me. I made my way to the platform ticket counter and joined the unavoidable Queue. No, I did not take advantage of the privilege so often enjoyed by my sex, of going slap to counter, 'Q' or no 'Q'. I always say, when we bring the roofs down crying for equality, we must show men that we can take anything as well as them, if not better—Qs being no exception. Platform ticket counters will not delay you much if only you bring the exact amount. But not so the man at the head of the 'Q'. He had a ten rupee note and wanted one ticket. Being one of those people who are lucky enough to be born under the right stars, he evidently was in the habit of fisting a tenner even if all he wanted was a 6 naye paise ticket. The Booking Clerk, a patient man started counting out the change. The people in the 'Q', which was getting longer every minute, were getting impatient. At long last Mr. Tenner moved off. I was slowly moving towards the counter. The man ahead was asking for a ticket

to Bezwada. Another species of Priestly's "innocents". The pity with these innocent ignorants is that they never bother to ask for guidance, specially when there are so many uniformed officials moving about too willing to help anyone who needs help and asks for it. But not so our man. He knew he had to join a 'Q' to buy a ticket and joined the first one he came across.

The first place you would go to if you were in my position would naturally be the Higginbothams Book-stall and that's exactly where I went. Many like me were leaning on the magazine counter. You can see almost all types of books there. But the crowd is around the magazine corner for there you see your favourite Movie Stars, your Cowboy and Comic Heroes. Most of the people around the counter were deeply interested in the magazine but very few bought any. The man next to me was there before I had arrived and was still undecided whether he should take Peter Cheyney's "Sinister Errand" or Agatha Christie's "One, Two, Buckle my Shoe", or Edgar Wallace's "Green Rust", which books he had retained in his hands after careful glimpses, or Leslie Charteris' "The Saint in London" at the attractive yellow jacket of which he was looking. I wouldn't be surprised if he took none. The stall attendant was looking at him in a helpless, pitiable way. For he had been watching the crine enthusiast all the time and had noticed how thoroughly the latter had managed to mix up the books he had so carefully arranged. I could almost hear him whisper between set teeth: "The customer is always right—no matter what he does or says".

"The Mangalore Express will leave from platform No. 2 at 7-15 P.M." The announcer was at his job. Very much like "polly" he sounded. He appeared to be a linguist for, after advising those in the station about the departure time of the Mangalore Express in English he proceeded to say it all over again in Telugu and Tamil. I noticed he carefully avoided announcing in Malayalam though the train runs for a considerable time through Kerala and carries mainly Malayalees. The train was waiting on the track and people were already getting in. There was no sign of my friend in the women's compartment at the rear so I decided to take a look at the one in the front. I saw many familiar faces. I am sure most of the people on the platform were there to see off some body or other and not just to pass time. I was passing the second carriage when I heard a 'P' & 'T' trolley announcing its arrival. The gap in the crowd opened up by the trolley was taken advantage of by porters and other vendors. The tail end of the procession presented a very interesting sight. The first thing I noticed was a very charming little boy seated on a pile of luggage being pulled along on a trolley. Now don't be misled by the word 'luggage'. Evidently the owners had not heard of the slogan "Less luggage—More comfort". The very way the things were piled up and the boy was precariously perched defied all laws of equilibrium. The trolley amazingly enough was making little noise. The weight of four steel trunks, two leather suit-cases, three hold-alls, five baskets, two mango saplings, one parrots cage and three 'grip' bags, had evidently choked

all protest out of it. God help the poor people who had to travel with the owners of the pile!

The third carriage was a mixed first and second. Above the chorus of 'Soda, Beedi, Cigarette', 'Mail', 'Ananda Vikatan', 'Swadesamitran' and of course the echoing 'Oram' meaning make way, I could hear a slick fruit vendor winning over a foreigner who was seated in a first class compartment. I wonder if he really wanted the apples. But the vendor was a born sales man and was talking in mixed Tamil and English. "Ten annas one, you buy now, good," there his English exhausted "Kashmir Kulu pazham Saar". I heard him conclude in Tamil and put six in the lap of the white man.

I walked past the women's compartment in the front. No signs of my friend. I walked over to the engine which was hissing and making an eerie whistling sound. I wondered whether all those instruments crammed into the "Dash-board" of the driver's cabin were really necessary.

On my way back I ran into my friend who was leaving by the Bombay Mail. When we reached the rear carriage we found our friend comfortably seated near the window in the women's compartment. But all was not well with the other occupants. Two women were almost at each other's throat. But the joke was both were shouting, non-stop, one in Tamil and the other in Malayalam. I was afraid that they would really come to blows; but a man entered the carriage and quietened them down speaking partly in Malayalam and partly in poor Tamil. He was evidently a relative

of the Malayalee woman. My friend told me that the whole 'galatta' was over a basket which Miss Madras had kept on the seat beside her. Miss Kerala it appears took it and threw it on the luggage rack. The man coolly took the basket off the luggage board and placed it below the seat. He got out a minute later cautioning the Malayalee woman not to yell.

A few minutes later the train pulled out. Everyone was waving. Such of the passengers who were lucky enough to get standing room in door-ways were waving too. An old man, walking alongside the slowly moving train, was asking an old woman inside the carriage to write as soon as she reached home and to give his regards to all. Scenes so familiar to all of us. The train cleared the platform and there was a mass of people men and women, young and old, slowly doing the right about-turn and moving towards the exit.

My friend again dragged me to the book-stall for she wanted a copy of the Photoplay. We didn't take long, and traced our steps to the platform where the rake of the Bombay Mail was just being pushed alongside the platform. Passengers with and without luggage were hopping on to the foot-boards and 'reserving' accommodation. The porters were doing the same. My friend and I stood away from the excited people for we didn't want to be pushed around and about or knocked on the head by steel trunks. The wild scramble was over. The rake had been braked to a stop. The scene became less violent. People were crushing through the doors gently but firmly. Some carrying luggage with them got wedged in between

doors but were pushed in by those on the platform. Some were trying the old trick of sending young men to 'occupy' seats first and then, after the first rush was over, coolly moving into the seats held for them. But I noticed that the advance-parties did not get out till the guard gave the whistle for the train to move, thus providing ill-got comfort for their own.

With the first class ticket in her hand-bag my friend was not in the least bothered by the unfortunate Thirds. She got inside the compartment and proceeded to make herself comfortable. Her neighbour for the night was a rosy cheeked effeminate young man, positively from the North. An old couple dressed in the garb of the North were talking to him softly but seriously. Evidently the young fellow was going to join a new job or something. A couple of minutes later he got out came to the old lady, probably his mother and hugged her mumbling something. Believe it or not he was crying silently. I could plainly see the tears roll down his cheeks. Then he came to the old

man hugged him and then prostrated before him and held the feet of the old man with both hands. The old man helped him up. I had seen this sort of thing only in Hindi films.

There was a sudden bustle and clapping of hands. A man in closed coat and trousers was coming towards the saloon. I had noticed ahead of my friend's carriage. He was followed by his entourage. Must have been some Minister or V.I.P.

It was time for the 'Mail' to leave and I was getting sleepy—what with a day's hard work in office and the busy time at Central, I was getting tired. So I was relieved when the guard blew the whistle. I shook hands with my friend and stepped back from the edge of the platform. The train started moving. The usual waving, the usual parting sighs, looks and gestures. I made my way to the exit ahead of the crowd.

I still have to find a place other than the Railway Station which will provide so much fun and life for 'Six Naye Paise'!



## INDUSTRIALISATION, FOREIGN EXCHANGE AND RAILWAYS

K. SRINIVASAN

IN this article, it is proposed to illustrate the importance of Railways' task in the Second Plan when the emphasis is on industrialisation with particular stress on the development of basic and heavy industries. Reappraisal and foreign exchange are also being discussed at some length.

It is essential that the community's attitude towards railways should be one of appreciation and sympathy. Even vastly improved services could not be sold at a reasonable price if they were constantly under propaganda attack. Blemishes are often magnified by influential sections who make it their business to bring the railways down. That the Railways are necessary, if the country's transport is going to move at all, is recognised. Above all, railways are the high productive form of transport. During the year 1957-58, 132 million tons of goods were moved and the railways proposed to move at least 168 million tons if not 180 million tons in 1960-61. No other form of land transport could touch such figures. It is not a question of divine right for railways but they are only a part of a larger whole of transport. But we must make them as efficient as we can and use them in such manner as will enable them to achieve high productivity transport in conveying the bulky materials and general miscellaneous goods, etc., during the period of accelerated Industrialisation.

Much is being said and written about the 'reappraisal' of the Plan

necessitated by foreign exchange difficulties and insufficiency of internal resources. The figures quoted in this connection have generally had reference to financial outlays and not to the physical content of the Plan. Yet, the later is really more important.

"Rapid industrialisation with particular emphasis on the development of basic and heavy industries" is one of the principal objectives of the Second Five-Year Plan. Through industrialisation, it is hoped to relieve the pressure on the land and achieve a substantial increase in national income and living standards. Basic and heavy industries have been accorded a priority not only because of our national advantages for certain of these industries, e.g., iron and steel, but because these can provide the foundation for further and larger industrial development without undue dependence on external help.

Side by side the development of this objective requires a large effort which is partly reflected in the strains and stresses through which the economy has been passing during the last two or three years. In terms of financial outlay, the effort envisaged was about 3½ times greater than in the First Plan. Whereas the new fixed investment envisaged in organised industries (excluding coal and other mineral extraction industries) in the First Plan was Rs. 327 crores—about Rs. 94 crores in the public sector and Rs. 233 crores in the private sector—the corresponding investment contemplated in the

Second Plan is Rs. 1,094 crores—Rs. 559 crores in the Public Sector and Rs. 535 crores in the private sector. The actual expenditure in the public sector may, in fact, turn out to be higher since in a number of projects the original estimates have had to be revised upwards.

As for railways the large industrial plan makes great demands on the railways. It is said care has, therefore, been taken to ensure that, despite the shortage of foreign exchange, the main requirements of the railways should be met in full. Thus the entire railway programme was originally put in the 'core' of the Plan. According to the original estimate the total goods traffic to be carried by the railways in the last year of the Second Plan was 181 million tons. The financial provision of Rs. 1,125 crores made in the Plan (of which about Rs. 425 crores was the foreign exchange component) was admittedly insufficient to enable the railways to increase that capacity so as to handle such a large tonnage. It is now, however, estimated that the tonnage to be carried in 1960-61 will not exceed about 168 million tons and it is believed that the railways will be able to carry this quantity. They actually carried 132 million tons in 1957-58. The World Bank has provided considerable loan assistance for railway development and this covers a good deal of their foreign exchange requirements. Notwithstanding this aid, it was considered necessary to review the schemes in the railway plan in order to effect a saving in foreign exchange. Among the schemes which are likely to be postponed or staggered are certain electrification schemes and the metre-gauge Coach Factory.

The expansion of the Iron and Steel industry is the largest single item in the industries programme. It is intended to raise annual output of finished steel from 1.3 to 4.6 million tons—2.3 million tons from the three new steel works in the public sector, Rourkela (720,000), Bhilai (770,000) and Durgapur (790,000) and the rest (2.3 million tons) will be obtained from the existing steel works in the private sector which are being considerably expanded. Apart from steel, the availability of pig iron is expected to be doubled. With the completion of these projects, the country will not only attain self-sufficiency in a basic commodity but may be in a position to earn foreign exchange by its export. There are also plans for manufacture of alloy and tool steels and stainless steel which play a vital role in the development of engineering industries.

Next in importance to the iron and steel industry and closely allied to it is the development of the heavy engineering and machinery industries. In this field, the Plan contemplated a complex of projects whose scope has been more clearly defined as a result of studies in the last two years. The major ones are (i) foundry-forge for heavy castings and forgings, (ii) heavy machine building plant, (iii) mining machinery plant, (iv) heavy plate and vessel works, (v) heavy machine tool factory, (vi) alloy and tool steel plant and (vii) heavy electrical plant project. It was realised from the outset that it would not be possible to complete all these projects during the Second Plan but it was hoped to make a beginning on them. In addition, it was expected that in the private sector there would be considerable expansion of engineering establishments

and of capacity for structural fabrication of all kinds, including the manufacture of cranes and earth moving equipment, cement-making machinery and machinery for such industries as cotton and jute textiles, sugar, tea and paper.

As a necessary concomitant of industrial development, plans were drawn up for large expansion of the coal mining industry in both the public and the private sectors—the target being to raise an annual output from 38 million to about 60 million tons.

These were the main features of the Plan for industrial development designed to lay a foundation which would enable further industrialisation to go forward more rapidly in future. What has been the impact on it of foreign exchange difficulties and to what extent have these necessitated its revision or curtailment? It can be said at once that there has been no need to revise or to modify materially the main content and structure of the industrial plan. Nearly all the principal projects are going forward substantially as originally contemplated, though in some instances delays have occurred due to the need to negotiate deferred payments. There was, however, no delay on this account in the case of steel plants and the coal and lignite-mining programme both public and private. When the seriousness of the foreign exchange shortage became apparent, it was decided that these must be proceeded with according to schedule. These were, therefore included in what has been called the 'core' of the Plan and treated as entitled to release of foreign exchange. Other industrial projects were not included in the 'core' and had to be

tied up with foreign aid or deferred payment schemes.

It must, however, be remembered that for all the big projects in the public sector technical assistance had in any case to be obtained from outside and the extra time taken in negotiating acceptable financial terms has not been considerable. Of the public sector projects, the plants for heavy machine building and the manufacture of mining machinery are being put up with Russian aid, while Czechoslovakia is giving assistance for the closely integrated foundry-forge project. The heavy electrical plant project is being undertaken with assistance from the British firm, Associated Electrical Industries Ltd., with whose good offices it has been possible to negotiate suitable deferred payments. Negotiations are in progress with the German firm of Bayers for the intermediates plant and with a number of firms for the alloy and steel plant. *Inter alia* the year 1958 marks the largest amount of U.S. assistance to India since the beginning of the Indo-American Technical Co-operation programme seven years ago. Of the total Rs. 760 crores (\$ 1.6 billion) to date, Rs. 299 crores (\$ 630 million)—nearly half of the total technical and developmental aid—has been made available in 1958. This allocation will assist India's Second Five-Year Plan projects at a time when the country is experiencing foreign exchange difficulties. Most of the assistance has come in the form of loans. The only exception is the grant of \$10.1 million in continuing support of India's malaria eradication programme—a joint venture of the Government of India and the

United States Technical Co-operation Mission.

To sum up, it may be stated that, in spite of the difficulties that have

arisen, the important parts of the Plan will be substantially carried out and sound foundations will have been laid by the end of the Plan period for future progress.

### Shakespeare's Philosophy . . . (Continued from page 37)

right person who happened to be a high ranking official (Chief Secretary of the Government), he said that this officer who photographed Government House would help the Government by his photographs than misuse the photographs. Incidentally, that Chief Secretary wanted this new-fledged photographer to take a photograph of him while the officer requested the

Chief Secretary not to let the Officer's friends know about this. He developed the photograph and handed over to him and had a laugh over the photographic adventure and also discarded the camera, though he sent the photographs taken for a photographic competition and got a letter of appreciation for taking photos of that important building.

*[The characters in this story are entirely imaginary and have no reference to persons living or dead.]*



"Panchsheela"

Photo: Shanmugasundaram,  
Accounts Dept., Perambur.

## MEN AGAINST THE MICROBE OR 'THE LAST LAUGH'

SHRIMATI

IT all started with a toothache: specifically, my toothache.

It wasn't the first, but it was certainly the worst. Family and friends said try salt water; the doctor said use gum paint; I sought my old ally, potassium permanganate, but all to no purpose. The spirit of Horatius was in that tooth and it wouldn't yield an inch (yes, by now I was feeling it in inches).

It was at this point I remembered the microbes. I remembered all that I had ever read about them, and that from a handy, informative, pocket-sized, pocket-priced Pelican. What's more, I remembered that I always believed anything that was printed. That did it! It seems there are microbes and microbes: good ones and bad ones, friendly ones and hostile ones, idle ones and busy ones, little ones and big ones. They breed in their millions and have a stubborn hold on life. You and I have one foot always in the grave but not these boys. That book said if you thought you could kill them off easily, you were mistaken. They were there practically before you and they are going to be there long after you. It takes 15 solid minutes' boiling to kill only the women and children. The housewife hopefully scalding even Avana-varam milk is only making a gesture: the Lysol you zealously swab floors with is for its perfume, and phenyle is probably an appetizer.

Small wonder then, I thought, that my tiny grains of permanganate could not turn back this mighty horde. Remained a painful (ouch!) regret that in my ill-judged curiosity I had lost even the comforts of ignorance. Why, I ask, do these scientists have to go and pry into secrets that are of no earthly use to anyone with a toothache? I admit there is a case for knowledge, and I don't actually mind wondering whether one fine day the sun will flare up and burn us to a crisp or cool slowly on a darkening landscape while the earth stands motionless. But I do mind feeling that when, with Anatole France's eyes, I have seen that last magnificent sunset, waiting to come into their own after me will be the triumphant microbes.

Finally, even my history has come unstuck. It is admitted on all sides that Henry II was a far-seeing monarch, a man whose vision could be trusted—a man practically before his own time (you try it and see)! Well, I put it to you, when such a man said, "will no one rid me of this turbulent pest?" I don't believe he was referring merely to an insubordinate cleric. I believe all the time he really meant the masterful microbe. My suspicion is that if you could see the last stage-directions in the drama of mankind they would read: 'Exit man, pursued by a microbe'.

## A Great Sound of Machines...

When Balbir Singh came to Jamshedpur from Bahrein in 1957, the site for the new Rs. 100-million Blooming Mill — a key unit of Tata Steel's Two Million Ton expansion programme — had just been cleared after levelling a large hillock.

Today this new 46" Blooming Mill, the largest of its kind in India, with a rolling capacity of two million tons, is all set to produce the blooms and slabs from which rails, structurals, plates, sheets and many other products will be rolled.

Despite the Suez Crisis which delayed vital supplies and other difficulties, the

rapid completion of the Blooming Mill was made possible by the devoted service of men like Balbir Singh. He and hundreds of other Indians, assisted by American and German technicians, worked round-the-clock on this major expansion project to produce more steel to strengthen India's economy.

**TATA STEEL**  
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## GOOD HEALTH IS MAN'S BIRTHRIGHT

Dr. A. RAMDAS

Divisional Medical Officer, Southern Railway

IN the Nov. issue of Southrailnews I discussed whether doctors and medicines are necessary to help us attain good health. Doctors and medicines alone cannot give us health. The way we live, work and rest are as important for a healthy life as medicines. I shall now discuss under the following headings how good health can be achieved and maintained :

- (A) Promotion of health.
- (B) Prevention of disease.
- (C) Cure of sickness.

### (A) PROMOTION OF HEALTH

By Promotion of Health I mean elevation of one's state of health to such a level as to leave a sizable surplus for meeting the challenge of ill-health. I shall now tell you how one can achieve a surplus of health.

#### 1. THE CONSTITUTION ONE INHERITS :

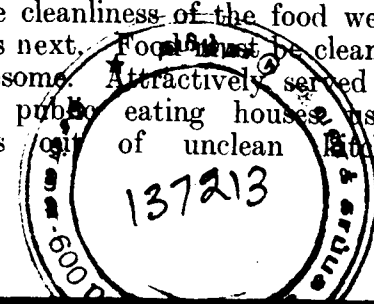
At birth each of us inherits a body which is a part of us till we die. A baby is conceived through fusion of a sperm (male element) and the ovum (female element) in the mother's womb. These elements from the parents carry in their minute constituent parts, various bodily and mental traits of the respective partners. The offspring which results from the fusion of these, naturally inherits some of the parents' traits in accordance with the Mendelian and other laws of Inheritance. Thus, a healthy and robust constitution is inherited. Mental traits are inherited. The tendency to develop some diseases like diabetes, cancer and mental disease are inherited. We now see what an

important part heredity plays in giving us healthy bodies and minds. Judicious control over selection of life-mates can therefore go a long way towards producing a healthy nation. But achievement of this is not always within realms of possibility unlike what obtains in animal breeding. The Soul of Mankind from time immemorial has abhorred regimentation in this matter. But discretion on the part of men and women seeking their mates would certainly contribute to achievement of good health by their offspring. With rising educational standards and advancing age of marriage in our country, we should in the not too distant future be practising scientific matrimony within civilised bounds.

#### 2. THE FOOD WE EAT :

Without food the body cannot live. Food includes water for practical purposes. A great part of ill health is due to faulty eating. Overeating causes indigestion, obesity and other diseases. Undereating causes malnutrition and renders the body vulnerable to infection. 'Eat to live' is sound advice, and eat only if you feel hungry. Duty eating at fixed hours, ceremonial eating at parties and eating without being really hungry when we see appetising food are bad for health.

The cleanliness of the food we eat, comes next. Food must be clean and wholesome. Attractively served food from public eating houses usually comes from the kitchens of unclean



Unclean food is a vehicle for various diseases. Eat as little food as possible outside your own home. A plate of rice and sambar prepared at home is worth dozens of appetising pulavs procured from outside!

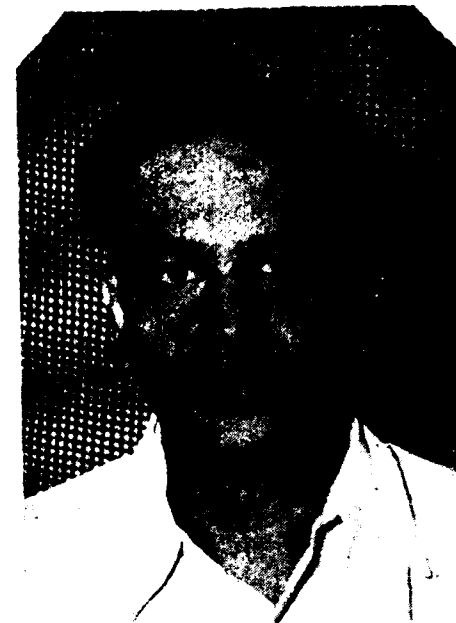
The composition of the food we eat is equally important. Chemically, food consists of carbohydrates, fats, proteins, minerals and vitamins. Each one is required to be present in food in certain proportions for maintaining health. Proper proportions of each in diet makes it 'balanced'. In lay language, foods are classified into cereals, pulses, animal foods, fats and oils, vegetables, beverages, sugar and salt.

Carbohydrates occur in cereals which include rice, wheat, barley and oats. These constitute the bulk of food. Each of these contains mostly starch but in varying quantities per grain. Starch is chemically a carbohydrate which is the chief source of energy or calories in food. Carbohydrate absorbed into the blood from the intestines is converted into complex body-sugars, which are physiologically 'burnt' to liberate energy required for bodily activity. Excessive consumption of carbohydrates in elderly people or people pursuing sedentary occupations, taxes the sugar utilising mechanism of the body, resulting in development of diabetes mellitus. It is, therefore, not good to consume large quantities of starch. Rice among cereals contains a large quantity of starch per grain. Wheat contains less. But rice is more easily digestible than wheat. A judicious combination of both is better than either of them alone. A mixed diet of cereals is therefore healthy.

Fats are oily substances of vegetable or animal origin. Coconut, gingelly and groundnut oil and ghee are examples. Fats are a rich source of energy, supplying more calories per gram than carbohydrates or proteins. Fats also carry vitamins with them. Fats are thus valuable as foodstuffs. But fats have some drawbacks. They are difficult to digest. Excessive consumption upsets digestion, besides leading to excessive fat break-up products in the blood. These products in the long run lead to obesity and degeneration of arteries causing high blood pressure and heart disease. Judicious use of fats is therefore necessary. Vegetable fats are less nourishing than animal fats but are safer from point of view of health.

Proteins mainly go to form the brick and mortar of the body, namely the cells. Deficiency of protein in food leads to wasting of the body and weakness. But excessive intake of proteins throws a strain on the waste eliminating apparatus of the body as the end products of protein utilisation are poisonous and have to be excreted from the body in urine and other discharges. Foods containing Animal and vegetable proteins are available. Meat, eggs and milk are sources of animal proteins. Pulses are the chief source of vegetable protein. Animal proteins are more nutritious than vegetable proteins but throw greater strain on the excretory organs of the body. A judicious combination of animal and vegetable proteins must be taken to maintain health.

Minerals in food are mostly utilised for building and maintaining the frame work round which the body is constructed namely the bony skeleton.



Dr. A. Ramdas

in its natural state, but are despoiled by our methods of its preparation and preservation. Simple methods of preparation preserve the vitamin content. If one takes good food, there is no need to swallow artificial vitamins in the shape of multi-vitamin pills which are religiously consumed by many sophisticated people. The need for regular consumption of artificial vitamins is an acknowledgment of the bankruptcy of the discretion of the consumer in the matter of selection of food and its preparation.

The other less important but yet needed constituent of food is roughage. This is the indigestible fibre of vegetable foods and fruits. Roughage furnishes 'substance' to the body of the diet and is required for smooth evacuation of the bowels.

Minerals also form vital chemical compounds in circulating blood which are responsible for maintenance of the delicate and dynamic chemical reactions that control bodily processes. Deficiency of minerals will weaken the strength of bones and teeth and upset the chemical reactions taking place in the blood and other tissues. The chief minerals in the human body are calcium, potassium, phosphorus, iron, manganese and iodine. These are contained in a variety of foods that are commonly eaten.

Vitamins are usually associated by lay people with good health. They are extremely potent substances which are effective in minute quantities and the deficiency of which leads to serious diseases of malnutrition. Vitamins are found in abundance in almost all food

Water is the chief constituent of the body. Deprived of water, the body will wilt and die. Blood which is the transport system of the body for carrying food to its different parts and for taking away the waste products for disposal consists chiefly of water. Water is also the chief constituent of the cells, the brick and mortar of the body. If water intake of the body is inadequate, the transport system gets clogged, resulting in lack of food supply and efficient disposal of waste products. Under certain conditions if excessively ingested also, it may disrupt bodily processes. When it contains harmful chemicals like calcium and sulphate, as some unwholesome natural waters do, it may dislocate normal working of the body.

(Continued on page 57)

# Hydraulic Wheel Presses

UPTO THE  
LARGEST DIAMETERS -  
with multi-piston  
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for pressing on and off  
locomotive and  
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## SING OUT THE OLD AND SING IN THE NEW

V. E. THIRUVENGADIAH

(Sub-head, Accounts, NJO, Madras-23)

Bid Adieu, dear Fifty Eight  
That tripped out last in light  
Yet, Thine days never out of sight  
But reckon in Thee aright.  
*The Earth* hath turned herself around  
And greater Sun one round.  
Not a moment's nap she had  
Bereft of rest, (still glad)  
Nor quick nor slow in all Her turn  
But steadily rounds the Sun.  
In Thee my dear fine outgone year  
We passed some times in fear  
For many a test of Atomics sprung  
And Sputniks too in swing  
Grateful thanks ours, hence to Thee  
For they to peace plenty ?

Ho, last of Fifties, Thou divine  
To ecstasies entwine.  
Come now, welcome, graceful Year  
In bridal march to altar  
To dedicate all and pledge your guide  
To lead us in good stride,  
Give your good mirth, gay laughter  
Of fun frolick chapters,  
Unfurl, unfold your bag, baggage  
Bestow us *Bon courage*  
To live in ease with peaceful mind :  
For now Man lags behind  
To keep off *envy* and *jealousy*.  
But oft he runs crazy  
To cause many nations woeful tears  
For vain glory in *colours*.

With all Thy calm and serene gestures  
Permit all best ventures.  
We hope and trust Thine Omnipotence  
As immaculate infants  
So, usher at most to this Universe  
More wreathed smiles, disburse  
With least of drought or spate or pest  
Or quake or gale or gust.  
The centuries old icebergs mutilate  
To fragments and mitigate  
The toils and spoils in deep-sea ways  
That confront navy many ways.  
May *rich and poor* live quite content  
With give-and take intent.  
The moans and groans of sick lessen  
(Perhaps their pre-births' sin ?)

Let Ind's granaries rise brimful  
By bumper harvests, still  
To export plentiful and profuse  
To the needy. And amuse  
Ourselves, of Thine gifts galore  
To be sung in sweet folk-lore.  
Let our *Inter-national debts*  
And *Internal deficits*  
Shrink, decrease and dwindle down  
And get them with scythe mown,  
The flora, fauna increase most  
By genial grace utmost.  
Bring us back our '*Pagoda Tree*'  
That aliens coveted 'n glee.  
All our emeralds wealth and gold  
Shower on *enmasse* bold.

Let noble sons of Ind in more  
(Sweedish) Nobel prize score  
For rarest wits or tips in science  
Or technique of the Minds.  
Ramanujam, the Maths prodigy  
And Raman, Rajajee  
And such and such of such a swarm  
Rise more in Thee and warm  
Thy name and fame in great reverence  
To inestimable eminence.  
Oh, sweetest sweet of last Fifties  
That speeds off to Sixties,  
Please promote our *Ahimsa Creed*  
And *Pancha Sheela's* lead.  
Gaze a while to excuse guiles  
In elegant wanton wiles.

Let our Railway's schemes and aims  
March up with least of maims  
To serve public for full value  
With gentleness in view.  
Let all trains keep right good time  
Though uphill some may climb.  
The shortage breakage of package,  
The wastage in luggage,  
The leakage and damage of goods  
In transport too of foods,  
Belated transits; more wharfage  
And still of more demurrage,  
The freaks of Nature in accidents  
And untoward incidents  
Avert, avoid, devoid and cleanse  
By Thine all potent glance.

The warring valiant rivalries  
And chivalries, revelries,  
The truces, triumphs and victories  
Disdainful dignities  
Enshroud in Time that reckons Thee  
Passing to *Eternity*.  
Many winks of moments count a day  
Such days roll on to say  
Of weeks and months and on to year  
So named by humans here.  
The last ho! sweetening Fifties dear  
Marching mute sober,  
Gazing all who *Do or Doze*  
In ostentatious pose,  
Let Thy march be of marvellous shine  
Of radiant hue: in fine.

*Let me repose my resolutions  
In Thee for my adoptions :  
To wear ever gentle softening Smile  
To all and all the while,  
To discharge Duties right earnest  
With conscience, zeal and zest,  
To bury the sneaking Self conceit  
With awful Ill and Hate,  
To drive out inborn great weakness  
To lie in thoughtfulness,  
To exploit not the weak, helpless  
In arrogant Wickedness  
To revere, respect Righteousness  
In dogged devotedness.  
Bless, to abide by Blushing Year,  
Lest I may linger rear.*

## LIGHT AND LOVE

Today WILL be a HAPPY DAY,  
If first alone You go apart from worldly things;  
And in Your heart You make resolve to Pray:  
And then to God You leave the rest.

For God WILL take the hate and fear,  
Of Yesterday and Yesteryear;

And in their place He'd make You feel:  
The Light and Love He'd reveal.

Yes, this WILL be a Happy Day  
If, friend, right now You'll start and pray.

V. T. NEELAKANTAN.

## DEDICATION

N. NAGARAJAN

[G.M(P)'s Office, Southern Railway, Madras]

Oh my Father of the Nation, Bharat Varsha,  
Let we people awake into the goal of thee.

Oh my Father, the author of a code,  
Ahimsa, Non-violence and Truth for all acts,  
Led by an inner voice with an urge for a say,  
Let my land arise into the act of thee.

Oh, my Father, you gave us a way.  
Desired of an action of unalloyed Virtue.  
Reinforced in its structure by a Sacrificing Oath;  
And let us have its way to our means in full.

Oh my Father, lead us your sons,  
To safeguard and strengthen the legacy of your wealth.  
That can't be embittered by "sly" or a Power,  
Paved not in the employ of morality with zeal.

Oh, my Father you accounted a practice,  
In the recovery of a service to Humanity at large;  
And with reasons to a terminus of tumultless tract,

Waging a War with no arms or bloodshed,  
And let we bloom to that candid cause.

Oh my Father, in you, lasted a light,  
Which lasts and will last,  
Till the layer of the Globe lays; and,  
Beacon us to its rays to see the source of your core.  
That contributed an interest conceived in a toil,  
Manured in the soil of Sarvodaya's field.

Oh my Father, the survey of your phenomenon.  
Unbounded by a love to a casteless creed,  
Be achieved to the full, in the days of our lives;  
And save us to the coil of the freedom and bliss,  
From the clutches of an eagle that scans the field to grasp,  
Though imposed to creep under the yoke and its shade,  
In time destined, but not destituted.

And in all your paths, there are ways to Peace,  
Needed on the date and needed ever in days.

## Good Health is Man's Birthright

(Continued from page 53)

Finally, food can be a dangerous vehicle for carrying harmful germs into the body. To prevent such entry, the intestinal passage is provided with many sentries. The saliva or spit in the mouth, the oft-removed tonsils, the acid juice of the stomach and the much maligned appendix in the abdomen are such sentries. They normally keep a protective watch over the Trojan Horse that food is. But a few "Greeks" do sneak in and cause havoc. So, one must take care to eat clean and uncontaminated food. Food can be contaminated by dust, flies

and hands of the food handler (food processor or the cook). Chances of contamination are greater when a number of people handle food during its preparation. The dangers of indiscriminate eating in public eating houses will now be appreciated.

Food eaten wisely is life sustaining. Unwise eating may be lethal. Food is not to be considered merely as a thing one has to consume daily without knowing what it contains and how it is to be prepared.

(To be continued)



THE 'J. C. Super' self-closing tap is a new tap of *glandless leakproof type*. It is an Indian invention and is made in our country. It is economical to install and economical to maintain.

The 'J. C. Super' self-closing tap is approved by the Chief Engineers, Public Health Engineers and Sanitary Engineers to the various State Governments. It is also included in the rate contract of the D. G. S. & D.

The 'J. C. Super' tap has been tested at the Government Test House, Alipore, Calcutta for endurance for 50,000 operations, even after which, it did not leak.



Patentees and Manufacturers:

**SUNDARAMS PRIVATE LTD.**

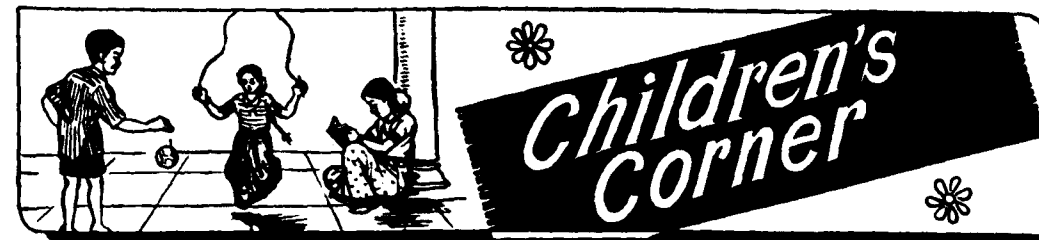
(Unit of TVS) TVS Building, West Veli Street, Madurai



**Special Features of 'J. C. Super' Self-closing Tap**

1. It is leakproof because it is glandless and self-closing.
2. Less wear because there are very few moving parts - only a washer to renew.
3. Easy assembly of the component parts with facilities to carry out repairs at site.
4. Any part can be replaced without having to condemn the whole tap.
5. 'J.C. Super' Tap has longer useful life than any other make or type, and is therefore cheaper to buy and maintain.

Patent No. 46294/1952 (India)  
Patent No. 104725/1954 (Pakistan)



**WONDERFUL WATER**

**W**HEN you are thirsty you drink a glass of water. When you want to have a wash or a bath, you must use water, hot or cold. When you go for a swim you have to dive into a pool of water. But is this all we think about this wonderful gift of water? Let us pause and learn a little more about the wonder of water.

What is water? The answer will of course depend on who is asking or answering the question. Most of us will want to answer that water is a colourless liquid with which we can wash, bathe, and clean ourselves, our clothes and other things that get dirty. Then there are some who will think of water as a drink that quenches thirst. A man who spends most of his life on a ship or lives near a river will promptly think of water in the sea or ocean, and of its vastness that seems never ending. The river man will think of water flowing down towards the sea. Next, we go to the chemistry laboratory, and the science master will tell us that water is made of two elements, that is two parts of hydrogen and one of oxygen. Now hydrogen and oxygen are actually gases, but when they come together in the parts as stated before, the two gasses change into a liquid. And if water is frozen, we get a solid, called ice.

Can we think of this world of ours without water? We would all dry up like a withered plant uprooted from the earth and thrown away. But water is so important to us and has so many uses that we could never live without it for more than a short time.

Water can be called one of the greatest servants of man, as well as of animals and plants. Men and animals are lucky, as when they are thirsty or need water for anything, they can go and search for it until found. But what about the plants and trees? They are rooted to the ground in one spot all their lives, and sometimes the life of certain types of trees are very, very long: as much as over two hundred years. Can you imagine being rooted to one spot for such a long time, and never being able to get water for your needs? But it is because water flows and moves that plants and trees can stay in one spot. And they do not always need you or a gardener to give them water. The water that plants and trees need comes from the ground underneath, as well as from the surrounding air, and when it rains.

When learning physical geography, you come to know that there are large masses of water all over the globe; in fact, there is more water than land. There is also a large mass

of water inside the earth in the shape of underground rivers and deep wells.

How then does water circulate? You are taught that the heat of the sun changes large masses of water into vapour, or gas. When there is a drop in temperature, the gasses come close together, form into little drops of water, which merge into masses of clouds. As the air gets cooler and cooler these drops become heavy and drop down to the earth in the form of rain.

Water never stays still, but is always flowing or on the move. So all this rain either flows towards some stream and thence to a river and so on to lake, sea or ocean. The rain that does not flow in that way, sinks down through tiny channels into the earth, to join the underground streams and rivers, and also gets drawn up the roots of plants and trees.

Water also does another great service for all living things. It is known as a common carrier. It carries supplies to living plants and animals, it carries them all over their bodies, it picks up waste matter as it moves along and carries them off.

Now you have seen things floating on the surface of a stream or river. But not all substances are floating along with water. As water flows it has the wonderful power of taking all sorts of substances into itself, keeping them there without much change while they are being carried along, and giving up these things to various forms of life when needed. What happens to these substances in the water? They appear to melt and become part of the water, but actually they are

still there. So water is called a solvent. From the rain as it falls, and while water is flowing over land, it is picking up minerals and other chemicals, all of which are valuable parts for plants, animals and human beings. So, when you drink a glass of water, you are not only drinking two parts of hydrogen and one part of oxygen. In the liquid called water, there will be found tiny quantities of all kinds of valuable mineral salts that are important for health and well-being. This also applies to animals who drink water, and plants and trees who get their supply from their roots and leaves.

Where else can water be found? It is said that there is not a living creature whose body content is not half water. Man's body weight contains two-thirds water, a fish which lives in water, is three-fourths water. Now, look at what seems to be solid fruit, like an apple. How much water does it contain? Divide the apple into five parts and it will be found that four parts are water and one part the rest of whatever makes up the apple. If the body did not contain so much water, life would not last long, as the life substance, blood, can only flow because of the water in the body. Blood is actually water with a lot of other substances carried with it.

Look at water in another way. Water flows, moves and has immense power within it. This power is so great that it can drive giant machines, and produce electricity too. What makes the huge steam locomotive move—steam, which is nothing but water heated up until it becomes a powerful expanding vapour.

We often talk of the seven wonders of the world, but if we kept our eyes and ears open, we could say that there are seven million wonders in this wonderful world, one of which is the wonder of water.

UNCLE TELLATALE.

## JEALOUSY AND FUN

ASHOK SRINIVASAN

RAMESH came running out of school. He was followed by Umesh who was a weaker but older boy. There was a deep contrast between the two boys. Ramesh was altogether poor. His slippers which were worn out by oldness presented a difficulty in running. He wore old clothes which showed that they were of charity.

Umesh on the other hand wore new shoes which showed that they were recently bought and gave him an advantage of running fast. His clothes were expensive and gave an outlook of being rich. The boys also deeply contrasted in strength. In short they contrasted in every thing.

Umesh who came running second gave Ramesh a kick which made him howl with pain. There was a silence which was at last broken by wild cheering. The boys did not care. Was not it after school hours? Was not Umesh, who had kicked the poor boy, Ramesh, a rich boy?

It was all in the fun of the school. Everybody was happy. But Ramesh was sad. His pride was hurt. He would have kicked the rich boy back, but a heavy hand fell on his shoulders.

On turning back, he saw the driver of the rich boy's car in his rich clothes opening the door of the car with one hand and the other on his own shoulders. The chauffeur gave a push to Ramesh and slammed the door. The crowd clapped joyfully. The car started and was gone in seconds before the boy started his tearful journey. All this happened in seconds but would not have been so noticeable if a gentleman had not elbowed his way through the crowd, took the fallen boy's elbow silently, gave the boy two annas for bus fare and silently walked away. The gentleman was Ramesh's uncle.

If Ramesh's uncle had not intervened, the boy would have broken down completely.

Ramesh paid his fare, got down from the bus and walked with dignity. Ramesh thought it an injustice to be treated thus and even if he was poor what right had the rich boy to kick him in such an unmerciful action? He would rebel against the boy; he would kick back but with such dignity that the rich boy would be ashamed. Such were the thoughts of Ramesh who had been wronged.



His mother asked him what was wrong with him, but he did not reply. He washed his legs, hands, feet and sat down to eat. As soon as he had eaten his last grain of rice, his mother called him "Son, will you just come here because I want you to watch me cook. I am growing old and will die after a few days". As he was watching his mother cook, he could control himself no longer. "Oh mother, why should people be cruel to me, a rich boy kicks me, a crowd laughs, and I cannot kick back. I don't understand this. Please tell me what to do."

Saying this, he broke down completely and fell on the mattress which was immediately below him. His mother

was as astonished as she was dumb-founded. She told her son "Dear Son, there are in this world many troubles which you must face—chiefly of rich and poor, you see. Now you will have troubles but later on your future will be good. You will be literate and your character will be good when you become rich. You will treat both rich and poor as equal, whereas look at the rich boy's future. Though rich, he won't be able to pass in his class and while you get rolls of money he will still be in College. His future will be ruined". Dear Son, I will give you this advice "The more you learn, the more humble you will be". So saying, his mother went on cooking.

## SOUTHERN RAILWAY

### TENDER NOTICE

Sealed tenders are invited for the supply of the following materials and will be received by the Controller of Stores, Southern Railway, Ayanavaram P. O., Madras-23, before 15-00 hours on the dates mentioned against each and will be opened by him at the time shown against each.

The prescribed form of tender is obtainable from the office of the Controller of Stores, on payment of Rs. 5 (Rupees Five only) per copy of each tender in cash or by Money Order. Remittance by any other means will not be accepted.

A sum of Rs. 500 (Rupees Five hundreds only) should also be remitted to the Chief Cashier, Southern Railway, Madras-3, as earnest money on or before the dates mentioned against each.

| Serial No. | Tender No., Brief Description and Quantity.                                                                                                                                         | LAST DATE FOR                      |                          |                              | Time of Opening. |
|------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------|--------------------------|------------------------------|------------------|
|            |                                                                                                                                                                                     | Sale of Tender Documents (15 hrs.) | Receipt of Earnest Money | Receipt of Tenders (15 hrs.) |                  |
| 1          | S. 236/VII/HA/M/858—<br>Three panel 11 K. V. Switch board for Sub-Station to Speen. HTSB/MAS/1. Quantity: Set 1.                                                                    | 27-1-1959                          | 29-1-1959                | 30-1-1959                    | 15-30 hrs.       |
| 2          | S. 236/VII/GB 4/B/873—<br>Wire mild Steel, ordinary galvanised 18 SWG to IS. 279/51 or to ISD/G/Ware-33 D. Quantity: Tons 5                                                         | 28-1-1959                          | 30-1-1959                | 2-2-1959                     | 15-00 hrs.       |
| 3          | S. 236/VII/F 2/M/339/1 & 2—<br>(i) Switch and Lock movement to IRS. Drg. No. SA. 3300. Quantity: Nos. 69.<br>(ii) Lock Facing Point to IRS Drg. No. SA. 3214/ADV. Quantity: Nos. 60 | 29-1-1959                          | 2-2-1959                 | 3-2-1959                     | 15-00 hrs.       |
| 4          | S. 236/VII/F 2/M/8/139 & 140—<br>(i) Signalling D.C. neutral track relays 9 ohms. Quantity: Nos. 19<br>(ii) Do. do. 1000 ohms. Quantity: Nos. 33                                    | 30-1-1959                          | 3-2-1959                 | 4-2-1959                     | 15-00 hrs.       |

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|------------|------------------------------------------------------------------------------------------------------------------|-------------------------------------|--------------------------|-------------------------------|-----------------|
|            |                                                                                                                  | Sale of Tender Documents (15 hours) | Receipt of Earnest Money | Receipt of Tenders (15 hours) | Time of Opening |
| 1          | S/236/VII/B/B/371/372—<br>Diesel or Petrol Driven Portable Rail Drilling Machine. Quantity: Nos. 3.              | 28-1-1959                           | 30-1-1959                | 2-2-1959                      | 15-30 (hours)   |
|            | S/236/VII/C/M/31—<br>Grade I geared column type or non-geared pedestal type drilling machines. Quantity: Nos. 2. | 30-1-1959                           | 3-2-1959                 | 4-2-1959                      | 15-30 (hours)   |
| 3          | S/236/VII/EB4/M/41—<br>Portable transformer welding sets 20 to 300 amps. Quantity: Sets 2.                       | 2-2-1959                            | 4-2-1959                 | 5-2-1959                      | 15-00 (hours)   |
| 4          | S/236/VII/B/B/202—<br>Diesel Engine driven Pump Sets of 17,400 GPH Cap. Quantity: Nos. 2.                        | 3-2-1959                            | 5-2-1959                 | 6-2-1959                      | 15-00 (hours)   |



### RAILWAY STATISTICS

By L. V. Gopalan, B.A., B.L.,  
14, Balakrishna Road, Mylapore,  
Madras

Statistics are numerical statements of facts in any department of enquiry placed in relation to each other; and the methods adopted for statistics are but devices for abbreviating or classifying the statements and making the relations clear. The elementary methods are based on arithmetical process of an easy but specialised kind; where more refined methods are found necessary for certain classes of investigation, complex mathematical ideas will be involved. Statistics may be called the science of accounting; while arithmetic attains exactness, statistics deal with estimates; sometimes very accurate, but never mathematically exact. Statistics are used for describing and analysing large groups or aggregates, too large or complex to be intelligible by simple observation, to generalise and repair the defects of individual experience. The principal uses of statistics are to give correct views based on facts as to what has happened in the past; how when and under what circumstances needs have grown and by comparison and analysis to search for the causes of changes that have taken place; to afford material for estimates for the present; and to make possible a forecast for the future. These therefore necessitate a study of the changes that

have taken place in the recent past in the light of the relations between the phenomena which comparative statistical analysis reveals.

Statistics supply the necessary information for solving the day-to-day problems, as otherwise decisions may have to be based on surmises and not facts. Statistics are useful in helping to educate the staff of the railway and at the same time have a very good effect as the staff realise that any slackness on their part will be reflected in the figures for their jobs. They are also valuable in teaching an officer his job as an analysis of the effect of the various factors which either improve or lower the results obtained, will make him realise on what points he should concentrate his attention.

So far, Railway statistics is concerned the three main objects are (1) to increase gross earnings, (2) to eliminate waste and (3) to enhance efficiency. There is a separate Statistical Branch working on the Railways to maintain the same. There is therefore, a need for a systematic and complete national statistics and a knowledge of the methods of statistics is absolutely necessary.

There have been many books on Railway statistics appearing periodically. Some are erudite while some outline in an easy style the various statistical items that are compiled by the Railway Administrations, their

interpretation as well as solutions. The book by Sri L. V. Gopalan, a retired Railway official, could be classed under the latter category and will be particularly useful for the new-comers to the Railways. The compilation details have been given here and there as well as interpretations and the steps that lead to deterioration or improvement in the statistical items. As usual, the author, has adopted an easy style in language readily intelligible to normal layman and it is therefore sure that sustaining interest will be created for any reader even though the subject itself is generally believed to be dry and drab.

As is to be expected, the author has made reference to the statistical items maintained by the various departments of the Railways. He has also taken enormous pain to indicate how transport bottlenecks are to be broken up and how line capacity is to be planned. The revisions of instructions in regard to some of the Statistical returns announced by the Railway Board have also been incorporated in the relative paragraphs of this book. There are a few cases where the same subject matter have been dealt with from different angles in different places but the author himself admits that the same should not be treated as a draw back, as different sequences are indicated in the same. A comprehensive index has been provided with space for adding or modifying the same. The book under review is worth reading by all and particularly by Inspectorial staff of all departments and by officers and men of the Statistical and Accounts Departments who have to deal with statistics in the course of their work.

## MAJOR INDUSTRIES OF INDIA— ANNUAL.

(Editor—M. P. Gandhi, Bombay)

We have already completed successfully the First Five-Year Plan, and are now implementing the second one. This though in a way a continuation of the developmental efforts made in the first, lays greater stress on industrialisation, and in particular on the development of basic and heavy industries. For the successful completion of the Plan a thorough knowledge of the various schemes and their progress at several stages is very essential. A publication dealing with problems of trade, irrigation, small and big industries, etc., and giving an unbiased and objective picture of developments in the country, is expected to make valuable contribution for national well being, and serve as a useful guide to us all. The publication of such a work involves great labour on the part of the Editor. Sri M. P. Gandhi is to be congratulated for his laudable efforts in bringing out such an informative publication. The Annual under review, with a forward by the Hon'ble Prime Minister of India contains authoritative informations on many subjects written by eminent personalities. In his article "Our Second Five-Year Plan" Sri Shriman Narayan refers to the expectation at the commencement of the Second Plan of raising a sum of Rs. 8,000 millions from external resources for the public sector, for meeting the overall gap in the balance of payments, and the unanticipated deterioration in the payment position due to worsening in the trade balance as a consequence of rising level of imports of materials for industrial

development, aggravated by the factors of larger imports of foodgrains, payments for Defence purposes, imports of raw materials to meet the higher level of industrial production, and decline in exports following the U.S. recession and curbs on consumer expenditure by the U.K. He explains how the deficit over the first two years was financed by official loans and donations, drawings from the I.M.F. and the depletion of India's foreign exchange reserves to the extent of Rs. 4,820 million, and how it led to a policy of drastic cut in imports since January 1957. The articles "Atomic Energy in India," "Climate for Foreign Investment in India," "Indian Foreign Trade" are very interesting. "Expansion of Railways" is an informative article by Sri Karnail Singh. In this contribution, the author refers to the tempo of development of railways envisaged during the Second Plan to keep in step with the expansion of production of steel and coal, the twin pillars of industry, and observes that several lines were doubled, several new ones projected, scheme of main line electrification of 1,250 route miles launched, several major yards remodelled to meet the challenge of lifting and transporting additional traffic as it develops, etc. He also points out that to cope with the growing volume of traffic, several workshops and loco sheds are being installed, route relay interlocking is being installed in Bombay and will be introduced in Howrah, Delhi and in the Madras area, signalling at 800 stations is proposed to be improved, and interlocking provided at various stations. Care has also been taken to conserve foreign exchange by developing pro-

duction in railway workshops, and he indicates that with the exception of steel, 75 per cent of the stores would be procured in the country. He also refers to the introduction of high capacity special type bogie wagons for bulk movement of materials, etc. "Air Transport in India" is another interesting article. In the article "Neyveli Lignite Project" Sri Sardar Swaran Singh, Union Minister for Steel, Mine and Fuel refers to the necessity of industrial and agricultural development of the South which has retarded mainly due to shortage of power and cheap fuels, and to the utilization of the large lignite deposits (2,000 million tons) in Neyveli in the South Arcot District of Madras. He observes that after a detailed preliminary investigation, the Government of India have decided to develop an integrated project for mining 3½ million tons of lignite, for generating 210 M.W. of electric power, production of 70,000 tons of nitrogenous fertilizers, and 380,000 tons of carbonized briquettes, etc. The cost of the entire project will be Rs. 750 million, and it will take 4 years to complete. The overall provision made in the Second Plan is for Rs. 520 million. He explains the immense potentialities of the project in South India, by provision of cheap power for development of various industries, old and new, including iron and steel, cement, plastics and plywood, electrochemical and agro-industries and for the yield of better agricultural crops through fertilizers, conservation of supplies of coal for metallurgical purposes, for prevention of wasteful transport of coal from Bengal to Madras, for arresting denudation of forests, diversion of cow dung and other animal manures from the

oven to the field, and generally for a balanced development of the country. Finally he observes that the project is something of a catalyst, a sort of leaven to foster industrial development in the South.

"Problems of Industrial Coal Consumers," "Automobile Industry," "Our Rayon Industry" and "Development of Steel Industry" are other interesting articles.

In the article "Indo-American Technical Co-operation," Mr. Howard E. Houston, Minister—Director, United States of America Technical Co-operation Mission to India, observes that U.S. Technical Co-operation to India takes many forms, but with only one purpose, *i.e.*, to help India in her progress. He points out the tremendous success of India's Five-Year Plans and the progress she has made in different fields, and indicates how the American technicians and specialists along with their Indian counterparts are participating in most of the basic agricultural activities, as also in the field of industry, including river valley development. A specific example of recent technical co-operation is the extensive survey of the Indian Railway system conducted by a team of experts from U.S. and the recommendations made by them to the Government of India. He also observes that technical co-operation has been brought to bear in health, sanitation and education and states that the programme is also interested in such projects as forest research, industrial research, small industries development, labour, public administration, social welfare and housing. He notes with satisfaction that though the American contribution through

the T. C. M. since 1952 is about \$392 million, it is small compared to what India herself has spent for her development projects, being only 7% of what India has spent in the First Five-Year Plan Projects, and that the United States can pride themselves as, "Partners in Progress" in India's great surge toward a future that is bright and promising.

The other articles are also interestingly delicious. There are plenty of illustrations and informative graphs illuminating this Annual. Printed in Art paper, the Annual under review is luxuriously got up and is worth preserving.

#### TEYNAMPET EXHIBITION SOUVENIR

The Teynampet Exhibition Authorities have brought out a Souvenir with a multi-colour front page with the Prime Minister, the liberator of Pigeons seeing two pigeons which are flying and are represented in the picture. There is a preface by Mr. C. R. Ramaswamy, General Secretary of the Exhibition. There are photographs of the Chairman of the Exhibition Committee, Manager, Electrical Engineer, a full size photograph of the Father of the Nation, the President, Vice-President, Home Minister of the Government of India, the Governor of the State, the Chief Minister and other Ministers of the State, and Sri S. Sathyamurthy, the Father of the Exhibition, also appear in the brochure.

There are a number of articles written on Reform of Local Administration in the State by Srimathi

Lourdammal Simon (Minister), Changing Pattern of Rural Self-Government by Sri K. Santhanam, Handlooms in our National Economy by Sri M. P. Nachimuthu, Agriculture and Food Production in Madras State by Sri M. Bakthavatsalam (Minister), Harijan Welfare Programme in Madras by Sri P. Kakkan (Minister), Housing in Madras State by Capt. D. Gnanavolivu, Integrated Neyveli Lignite Project by an expert engaged in the Project Overture to Contemporary Painting—South India by M. Anantanarayanan, I.C.S., Medical Education in Madras State by V. R. Thayumanaswami, Director of Medical Services, Power Development in Madras State by Sri P. A. Appadurai, Chief Engineer, Madras State Electricity Board, and our duty to Wild Life by Sri C. A. R. Bhadrar, I.F.S. (Chief Conservator of Forests, Madras), and also other articles appear in the brochure.

Apart from the multi-colour get up of the front page there are pictorial illustrations inside which are attractive. It is a good publication and is well got up. It has also been presented in a nice plastic cover. Publishers, T. Deena Dayalu, Madras-17; price Re. 1. The authorities must be congratulated for having brought this attractive brochure.





## OXYGEN SERVES THE RAILWAYS

The Indian Railway system is Asia's largest and is a vital factor in the country's development.

The nation's arteries have to be maintained in sound health. Railway engineers rely increasingly on welding for maintenance of the permanent way, bridges, locomotives, wagons and coaches.

Indian Oxygen with its countrywide organisation, serves the Indian Railways in many ways. Besides the supply of industrial gases, welding materials, welding and cutting equipment, this service covers technical advice, tuition and expert assistance in all problems relating to welding and its allied processes.



**INDIAN OXYGEN LTD**

## CHILDREN'S DAY—PERAMBUR



*Sports events*

The Loco and Carriage Works at Perambur jointly celebrated the Children's Day on 14th November 1958.

There was a Film Show at 6-00 P.M. in the 'New Hall' (E. & A. I. Institute, Perambur) under the Presidency of Sri M. Nagaraja Rao, Loco Works Manager. The audience appreciated the show very much.

*Fancy dress competition*



*At the harbour*

On 6th December 1958, Children's Sports were conducted and as many as 500 children participated. All the children were given free refreshments and tea—thanks to the co-operation extended by the Tea Board, Madras.

An interesting programme of events was gone through and many valuable prizes were given to First, Second and

*A view of the gathering*



Third place holders. Sri B. H. Sreekantiah, Dy. CME(W), presided. Sri Nagaraja Rao distributed the prizes to the winners. Those who came 4th, 5th, 6th and 7th in the events were taken on a picnic on the 7th morning to various interesting places like the Zoo, the Museum, the Tea Centre, where Children's Films were shown and preparation of Tea demonstrated, the Beach, the Harbour, etc.

The Fancy Dress Competition provided good amusement.

An elocution competition was also held and both Boys and Girls participated in this event. The winners in this event, 1st and 2nd, were awarded prizes in the shape of valuable books.

Thanks are due to the organisers who conducted the celebrations to the satisfaction of the staff and their children. This was the first of its kind in the workshops in Perambur.

### FAREWELL PARTY TO SRI P. RAJU NAIDU, A.C.S./TPJ

Sri P. Raju Naidu, after passing the First Examination for the Degree of Licentiate in Medicine and Surgery from the Madras Medical College, joined the ex-S.I.Rly. Co., Ltd., in 1929 as an Inspector in the Catering Branch of the Commercial Department, where his father, the late V. Purshotam Naidu was the Office Superintendent. He underwent training in the Rates and Development, Claims, etc., for a period of two years and he was absorbed

as Commercial Inspector in 1940. By dint of hard and sincere work, he reached the top grade, i.e., Rs. 360-500 in 1954 and was promoted as Assistant Commercial Superintendent in April 1956 and went on leave preparatory to retirement—on the afternoon of 16th March 1959, after 30 years of faithful and loyal service.

The Southern Railway Officers' Forum, Tiruchirapalli, arranged a Dinner Party on 18th December 1958 and the staff of the Office of the Chief Commercial Superintendent also, got up a pleasant function on the 19th to bid farewell to Sri P. RAJU NAIDU on the eve of his retirement, which was attended by Officers of all departments.

Sarvashree Sivaraman and M. G. Natarajan of the CCS's Office spoke at great length eulogising the services rendered by the guest and wished him long life with good health. Sri P. Raju Naidu thanked the Officers and Staff for the honor done to him and expressed that he had been doing his duty trusting in God and did not deserve such encomiums; however, he advised the staff to maintain discipline, and to put forth hard work which alone would bring them to the fore-front.

Sri Ravindranath, D.A.O., who presided over the function and Sri H. R. Delvi, D.C.S., expressed their sentiments about the achievements of the guest and wished him long life.

With a vote of thanks to the chair and singing of the National Anthem, the function came to a close.

A problem person is a person with a problem, not merely a person who creates a problem. Or, to put the matter differently, he is a problem to himself—and therefore to others. Railwaymen are a problem to themselves and they have several *personnel* problems to solve. IYER'S HANDBOOK FOR RAILWAYMEN helps solve these. Rs. 5 plus Re. 1 postage. 22-B, Sirdar Sankar Road, Calcutta-29.



The Officers of the Stores Branch were entertained to lunch by their chief, Sri P. N. Talati at his residence on 22nd Nov. 1958

#### SRI A. B. KRISHNASWAMY OF SOUTHERN RAILWAY TO COACH INDIAN RAILWAY ATHLETES

Sri A. B. Krishnaswamy, SLWI/Sports of Southern Railway, who is a senior coach of the Amateur Athletic Federation of India, has been appointed in the Railway Sports Control Board, New Delhi, as the Athletic Coach of the Indian Railways. Sri Krishnaswamy, it will be remembered, was an outstanding athlete in his younger days. He had his early training for over 15 years under the late Mr. H. C. Buck, Founder of the Y.M.C.A., College of Physical Education. He led the Southern Railway Team in the Inter-Railway Sports and won the championship for Southern Railway for 8 years until 1957. Sri Krishnaswamy, in recognition of his meri-



torious services, received a Railway Award for his good work in Sports last year during the Railway Week from the Hon'ble Minister for Railways. A successful coach, Mr. Krishnaswamy has at least 7 athletes on the Southern Railway, who hold National Records. He is the son of late Dr. Bhashyam Mudaliar who served in the ex-M. & S.M.Ry. as a District Medical Officer.

#### CLAIMS INSPECTORS' FORUM

A meeting of the Claims Inspectors' Forum was held in the headquarters office of the Railway on 16th December 1958. Addressing the Forum, Sri J. B. Rao, Chief Commercial Superintendent said :

" This idea of a Forum, which you have developed, and which I see you are enthusiastically following, is definitely a very unique one. I hope you will be able to do such good work that will catch the imagination of other railways also. I think it would be a great help if some of you actually come prepared with some papers on some important aspects which you can read out. If the points for discussion are presented in the shape of papers, which can form the basis of discussion, I feel there would be a permanent record which would be of use to others and also would focus your attention in discussing a particular matter. For instance, you may discuss the problem of how to sheet a wagon. It is not an easy matter. As you know, we had to spend quite some time to think out how to do it or how to rivet a wagon properly. These are from the Claims Prevention angle. There are various other aspects of claims settlement, inspection of stations, etc. I would suggest that the papers are submitted well in advance so that everybody can know what is the paper that is coming up for discussion.

Sri Rangachari, the Secretary of the Forum, told us just now that there are no set rules or guides to be followed by Commercial Inspectors. That is the very thing that some of you might take up. There is no reason

why if there is no Guide now, there should not be one in the future. Such of you as have the gift of writing might well think of writing a Guide, which will be useful to the more junior people who are to come up, how to conduct surveys on various types of commodities, etc. For instance, take the case of hides and skins. There are always some technical points which you have got to know. There are several Commercial Inspectors who do not know how to check up whether a particular hide and skin consignment is damaged, and if so to what extent. If you happen to be a man who is dealing with this, and have an occasion to meet an expert, you would know the technical method of assessing the damage and you can put it in writing. It would be of great help to other young people. Or take valuable consignments of tea or cardamoms. Assessment of damages in such cases is a difficult process. Some of you may have got the experience of dealing with such goods. The Inspector at Cochin may have useful information to give about tea. Very often when you look at a consignment, an inexperienced man may feel the whole thing is damaged and we will have to pay a heavy claim. When we send an experienced Inspector, he gets the claim settled for a much smaller amount. These are matters which can be obtained only by experience. So, I would suggest that in view of the fact that there is no Guide, some of you may think of writing one, for the guidance of others.

When I was on the Division at Jhansi many years ago, I issued

instructions as to what an Inspector can do if he has got only half an hour, 2 hours, or 6 hours, or a complete day at a station. The Inspectors used to tell me that they do not have much time to inspect stations. I told them that even if they had half an hour, there were certain aspects which they could check. Even in a passing train, you can make a check. For instance, when you are passing through in a mail train and already there is a passenger train and you find the Ticket Collector collecting tickets, you will be able to find out whether the man is collecting tickets properly or not. Similarly, if you are there only for half an hour, you must know that there are registers which will give you a grip of the work at the station. On the Southern Railway, the responsibility of inspection of stations is not with you for the present. But, we have almost completed the division of Traffic Inspectors into two categories, one to do the inspection on the Commercial side, and another to do the inspection on the Operating side. Without regular inspection of stations, irregularities are bound to accumulate. Our desire is not so much to catch a man at fault, but to put him right and see that he does things properly. It is only right that such of the senior Inspectors like you, who go to the station, find out as to why mistakes are committed by staff. Mistakes are committed due to two reasons: one is a deliberate attempt to commit fraud. There you have nothing to teach the man. But the majority of mistakes are done due to sheer ignorance. He does not know how to do a thing properly, and as you know, if you do not know how to do a thing properly you tend to neglect



it altogether. It is something like studying for an examination where if a subject is difficult, you put it aside. So it is up to you to go and find out and tell the many new recruits that we have as to the correct methods of working, so that they can be set right on the proper road for working of the Railways.

The importance of Inspectors in our whole system of work cannot be over-emphasised. You, the Inspectors, are practically the king-pin of our organisation. I know for a fact that the Inspectorial staff dealing with claims work on the Southern Railway are some of the very best on any Railway. I know that, because I

have seen some of the reports which come up to me occasionally. The quality of work is as high if not higher, than on any other Railway. That is why we are able to maintain a leading position so far as the Claims side is concerned, where the Southern Railway is about the very best of all the Railways. But I cannot say the same thing in certain other aspects—say, for instance, quick movement of traffic and inspection of stations. I think we cannot say that in these aspects our performance is really as good as that of some of the other Railways. I personally feel that it is so because almost all the other Railways have got a separate cadre for Commercial Inspectors. As I said, we are also going ahead with a scheme which will be brought into force very soon, and I am confident the tone on that side also will come up.

Inspections have to be made with greater thoroughness and greater purposiveness. When you go to a station you must make it a point to spend some time on the broad aspects of station working, even if it is not the purpose for which you have gone to the station. Take the question of prompt arrival of consignments. That is work which the Claims Inspectors must look into, because it is really the slow movement of traffic that ultimately recoils in the shape of heavy claims, either on our Railway or on some other Railways.

The problem of movement of 'smalls' is a very intricate problem. This is an intricate problem not only on this Railway, not only on other Railways, but all over the world. In America it is called 'L.C.L.' (Less than the Car Load) traffic. That

problem is facing the entire world and bigger countries like America, who have got more money to spend, have certain methods or equipment which we cannot adopt. We have got to deal with what we have as best as we can. We are going into this problem, which has now become practically a matter of life and death for us. We are losing very heavily to the roads. Roads are making very heavy inroads into our revenue. We have certainly lost that position of monopoly which we have been enjoying all these days. As you know, so much traffic that used to go by rail formerly, is now freely moving by road. There are two reasons. One is the 'rate' aspect and another is the 'service' aspect. No trader is in love with the road or rail. He wants to make the greatest profit. The whole purpose of transport to him is to move his goods at the cheapest possible rate and at the quickest possible speed. Several enquiries made show that the rate aspect is not always so important. Traders often go to the road, because they are very much dissatisfied with our 'service' aspect. That is the sad part of it. The merchant community do not mind paying a little extra by way of higher rates to the Railway. There are advantages in sending the goods by rail, such as negotiating the Railway Receipt through banks. Banks do not generally take the Receipts issued by motor lorries, except in the case of some of the biggest operators. The Banks are prepared to give greater credit to our Railway Receipts. But, if a consignment is booked, supply of wagons in time to move the goods is not assured. After the wagon is supplied, then comes the question of actual movement.

We cannot say when it will reach the destination. There is great scope for improvement and great scope for original thinking and real contribution to the science of transport in this respect. All of you gentlemen, who have an intimate knowledge of the working on line, I am quite sure, should be able to suggest methods as to how to handle the "less than wagon-load" traffic.

The public are our customers. They are also our masters. We are the servants of the Indian Railways. But, if a man goes to a station for booking a consignment, it is complained that unless he tips, he cannot make any headway. Similarly, in the matter of delivery of consignments, there are complaints. It is stated that this is one of the reasons why traffic is being driven to the road. This again is a "service" aspect. It has nothing to do with rates. A merchant is not able to get his goods booked within the rules conveniently. You, as Inspectors, must put this down with a firm hand. You can rest assured that if cases of this kind are brought to our notice, there will be no question of any mercy or leniency shown. As I have told you, we are not so anxious to catch them and punish them actually, as to prevent this blot on our fair name. These are things which you will have to prevent by going about and keeping your eyes open and acting fearlessly. It strikes me that one of the circumstances that encourages this sort of thing, is an occasional ambiguity about our instructions. It is necessary for you to correctly explain the rules

to our own staff, so that there is no question of any of them taking shelter under any possible ambiguity. I have found that some of our instructions are not quite clear. I would request that when you come across such instructions, you bring them to the notice of the officer concerned and get the rules, procedures or orders clarified. Getting clear instructions issued is an important part of your duty. Go through the Divisional Circulars and understand them well and if there is any difficulty, go to the officer and have it clarified.

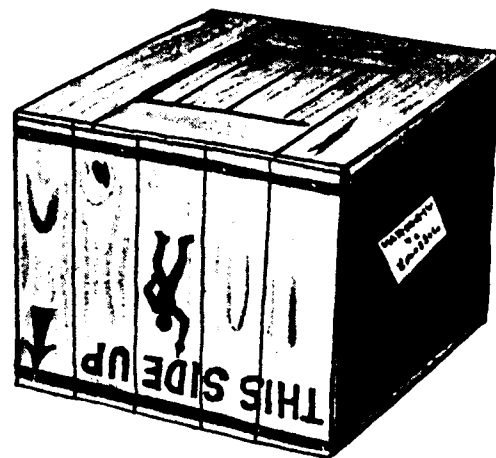
I hope you will have a very useful session, and if possible, you can get a record of your discussion. It would be of interest to see what you have discussed and what problems have come up to you. There may be some problems in which our instructions are not clear. I would like to be able to check up whether any of the problems which you discussed are a result of something to be clarified from my office. I should like to see the subjects that you discuss, the difficulties that you have come across, and if I see them I may also be able to assist you in the matter of solving the problems. I wish you all success in your deliberations. I will be looking forward to seeing the results of your discussions, to see whether there are any new ideas which can be adopted."

Sri S. Rangachari, Claims Prevention Inspector and Secretary of the Forum, spoke on the activities of the Forum.

Sri V. C. Audiapatham, Claims Inspector, proposed a vote of thanks.



*This may do you good...*



*But...  
This certainly is no good  
to the package!*

IT WILL LEAD TO DAMAGE  
*Keep Packages Top-side up*

SOUTHERN RAILWAY





Sri S. V. Ramaswamy, Deputy Minister for Railways cutting the ribbon to declare open the remodelled Cuddalore N. T. Railway Station on 17th January. Dr. A. Ramaswamy Mudaliar, who presided on the occasion is on the left. (Right): Sri S. N. Barua, Senior Deputy General Manager, S. Rly., delivering the welcome address. A detailed report of the function will appear in the next issue

Left top : The Deputy Minister for Railways addressing the gathering at the football match between S. Rly. team and Cannanore team at Salem on 6th January. S. Rly. won by 3 goals to nil. Bottom : The Dy. Minister discussing with Chief Optg. Supdt., Chief Engineer and General Manager at Headquarters Offices at Madras. Right : The Players of the I.C.F. team (top) and Southern Railway team being introduced to the Deputy Minister

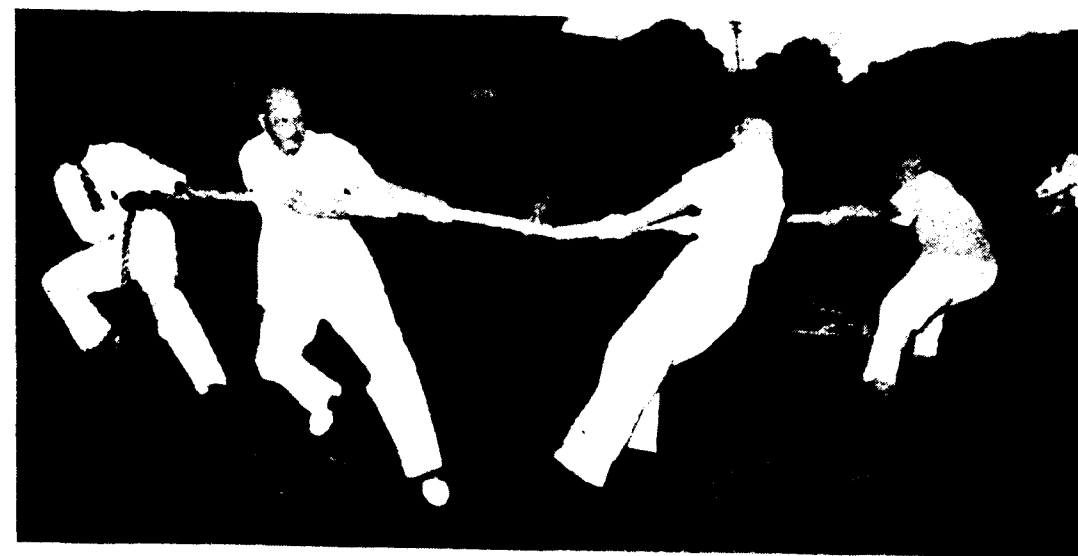


Putting the shot



Women Competitors

Tug-of-war between officers of the headquarters lead by Sri S. N. Barua, Senior Deputy General Manager and Officers of the Division lead by Sri D. B. Patel, Divisional Superintendent, Madras



Sri S. N. Barua addressing the gathering



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Sri D.B. Patel leader of the successful Officers' team receiving the prize from Smt. Barua

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Bottom left : Sri S. Chakravarti, former CME, Southern Railway, now Director, Production, Railway Board, addressing the Officers at the Headquarters Meeting Hall giving his impressions of his tour in the Continent as a member of the Trade Delegation to U.S.S.R.

Top : A view of the audience. Sri A. C. Mukerji, General Manager, Dr. P. A. Menon, Chief Medical Officer and other Officers are seen in the picture.

Bottom right : Sri Chakravarti addressing the Officers at the Officers' Club, Perambur at the farewell function held in connection with his transfer to Railway Board.



The players are introduced to Sri J. B. Rao, CCS ; Sri N. Seshachalam, DCS(R) is also seen in the picture.

# INTER DIVISIONAL HOCKEY

## PERAMBUR



The Suburban Rly. Users' Zonal Committee Meeting was held at Headquarters recently.



Supervisory Committee for catering on S. Rly. held a meeting on 6th Jan. at Bezwada. Top : Sri J. B. Rao, CCS, who presided and Sri Chinnikrishna, DCS/RR. Centre and bottom : The meeting in progress.



The S. Rly. Zonal Time Table Committee in session presided over by Sri P. H. Sharma, COPS  
8th and 9th Jan. 1959.

### MATHEMATICAL PRODIGY HONOURED

Under the auspices of the Navyakala Niketan of the Southern Railway, Sri L. Sanjeevaraya Sarma, blind mathematical prodigy of India, was presented with a purse and a medal for his extraordinary power in solving mathematical problems of any type

without recourse to pen or paper on December 24. Sri J. B. Rao, Chief Commercial Superintendent, Southern Railway, presided over the function. Sri S. Seeta Rama Rao, Secretary, explained the aims of the Association. Sri T. Ramachandra Rao, Vice-President, welcoming said that Sri Sanjeeva Sarma hailed from Kallur, a village in Prodattur Taluk, Cuddapah District

in Andhra, and paid glowing tributes to him. He appealed to the Government of India to give Sri Sarma an opportunity to tour abroad to exhibit his rare abilities in foreign countries.

Sri B. Venkataramani, Secretary to General Manager, Southern Railway, also paid tributes to Sri Sarma and Sri S. L. Narasimhan, President of the Association, proposed a vote of thanks.

### PASSING-OUT PARADE OF TRADE APPRENTICES GOLDEN ROCK

A lively function was got up in the Stadium Grounds in Golden Rock in connection with the Passing-out Parade of Trade Apprentices on 27th November 1958.

The function also included display of physical exercises by the staff and fire display by Golden Rock Workshop staff. A gathering of nearly 5,000 men and women witnessed the performance.

Sri D. Venkataswami, Deputy Chief Mechanical Engineer, welcomed the Chief Guest and President of the occasion Dr. E. P. Mathuram, M.L.A., Municipal Chairman, Tiruchirapalli. He traced the history of the training of Trade Apprentices in the shops. He also thanked the Chief Mechanical Engineer for kindly agreeing to the proposal of giving mass physical training and drill to the Trade Apprentices. It was pointed out by Sri Venkataswami that the Trade Apprentices had attained a high standard in Mass Physical Training and Drill within a period of three months. The training given in physical exercises was on the

same pattern as that given to the Railway Protection Force staff at Kimber Gardens. The Mass Physical Training to the Trade Apprentices is the first of its kind in the Southern Railway Workshops. This training, the Dy. Chief Mechanical Engineer pointed out, was motivated with a view to create a sense of discipline and comradeship amongst the Trade Apprentices apart from improving their physical health. He also said that considerable skill is available in the shops in physical exercises and fire display. He thanked the Chief Security Officer and the Commandant, Railway Protection Force for the help and co-operation they gave in training the Trade Apprentices in Physical training.

Delivering the Presidential address, Dr. Mathuram said, that he had witnessed one of the unique displays by young Trade Apprentices in Tiruchirapalli. Considering the limited time, he said, the display was magnificent and spoke well both of Trade Apprentices and the Protection Force staff, who trained them. He also expressed his great appreciation of the staff of Golden Rock shops for the display of the physical feats and fire display. He advised them that they should keep united and take sustained interest not only in their outside activities, but also in the activities inside the workshops, so that the Nation may prosper.

After distribution of prizes for the best cadets of the Trade Apprentices and certificates of merit and medals for the staff of the Golden Rock shops and the vote of thanks by Sri Ramachandran, Assistant Works Manager (General), the function came to a close.

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## SOUTHERN RAILWAY

Tenders for "Proposed crossing Station between Bugganipalle and Panyam at mile 309/1-2".

The last dates for issue of tender forms, payment of earnest money, receipt of tenders in office and opening of the same for the above work have been extended as follows:-

| Particulars                        | As previously advertised | As now extended         |
|------------------------------------|--------------------------|-------------------------|
| <b>LAST DATE FOR</b>               |                          |                         |
| (i) Issue of tender forms          | 15-00 hours on 19-1-1959 | 15-00 hours on 2-2-1959 |
| (ii) Payment of earnest money      | 16-00 hours on 19-1-1959 | 16-00 hours on 2-2-1959 |
| (iii) Receipt of tenders in office | 16-00 hours on 22-1-1959 | 16-00 hours on 5-2-1959 |
| (iv) Opening of tenders            | 16-00 hours on 22-1-1959 | 16-00 hours on 5-2-1959 |

Divisional Supdt.'s Office  
(Works Branch), Guntakal.  
19-1-1959.

DIVISIONAL SUPERINTENDENT

## SOUTHERN RAILWAY

### TENDER NOTICE No. 22

The Divisional Superintendent, Southern Railway, Guntakal, invites separate sealed tenders for the following works upto 16-00 hours on 23-2-1959:

| Sl. No. | Name of Work                                                                                          | Approximate cash value of work | Earnest money to be paid |
|---------|-------------------------------------------------------------------------------------------------------|--------------------------------|--------------------------|
|         |                                                                                                       | Rs.                            | Rs.                      |
| 1       | Gooty:-Remodelling of Yard and extension of Loco Shed                                                 | 1,46,800                       | 3,670                    |
| 2       | Proposed experimental ballasting between miles 0/5 to 4/5 and 32/4 to 40 4-Dharmavaram-Pakala Section | 2,19,200                       | 5,480                    |

Last date of deposit of earnest money with the

Divisional Paymaster, Southern Railway,

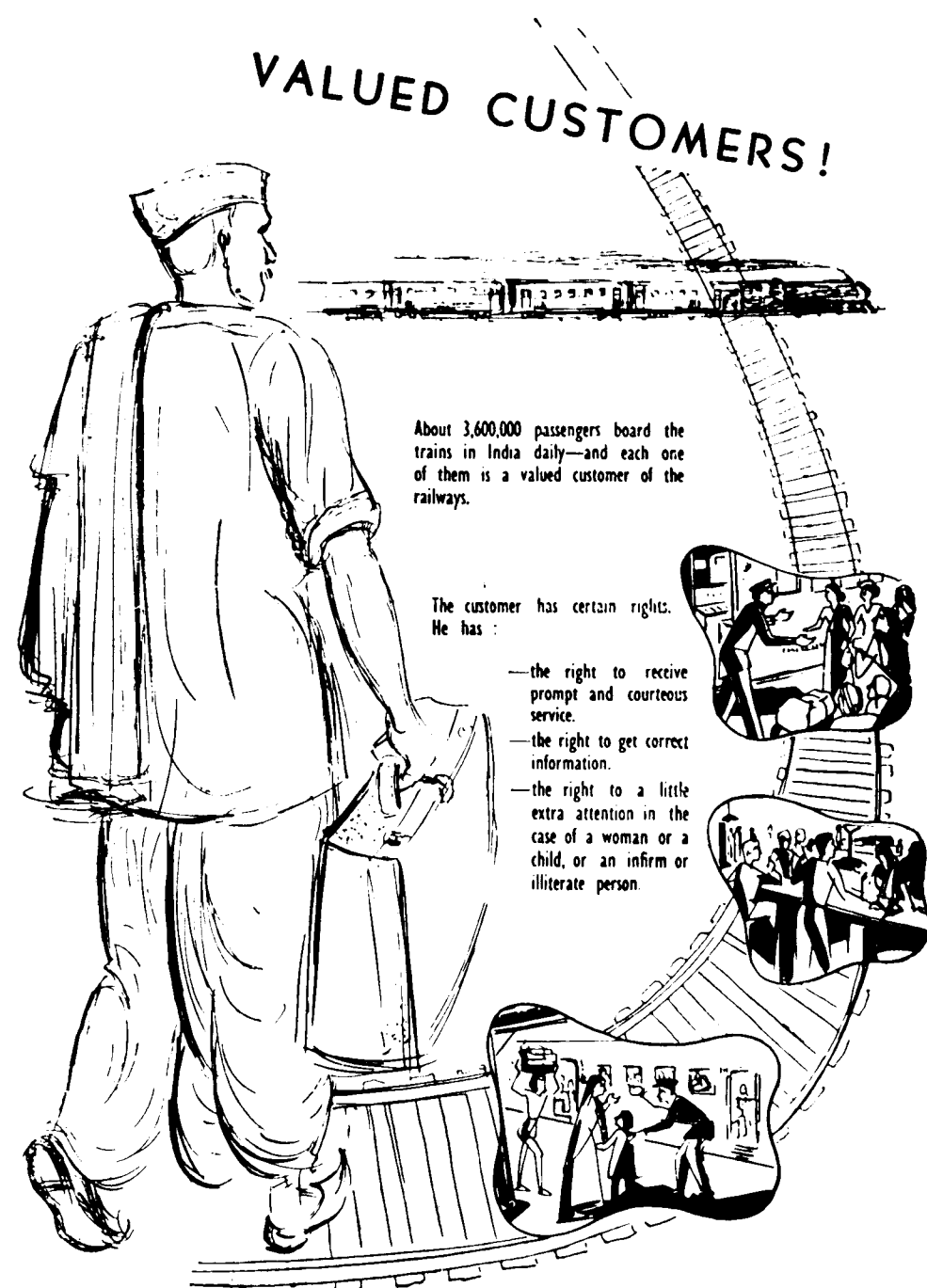
Guntakal ... 16-00 hours on 20-2-1959.

Last date of issue of tender forms ... 15-00 hours on 20-2-1959.

Date of opening of tenders ... 16-00 hours on 23-2-1959.

Further particulars and tender forms can be had from the office of the Divisional Superintendent (Works), Southern Railway, Guntakal, on production of a receipt for a sum of Rs. 10 towards the cost of tender form in respect of each of the above works paid to the Divisional Paymaster, Southern Railway, Guntakal or any Station Master on the Southern Railway before 15-00 hours on 20-2-1959.

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Issued by SOUTHERN RAILWAY