

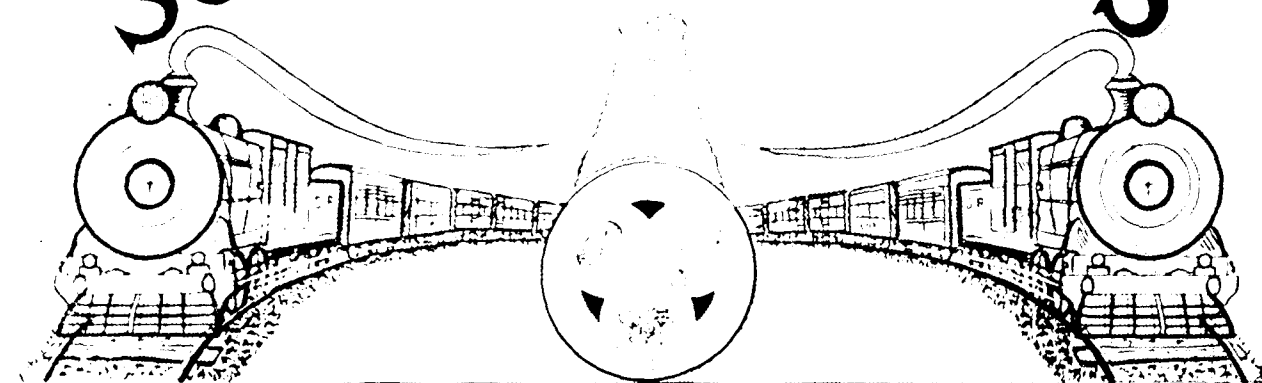
3278

SOUTH RAIL NEWS.
V2. NO2. MAY 1988.

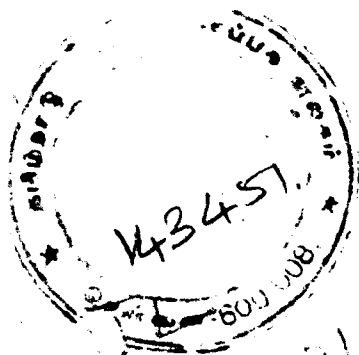
CL
X415m21, N5SR.
MISS 21-2-
143450.

76

SOUTH RAIL NEWS



PUBLISHED BY THE SOUTHERN RAILWAY
VOL. II MAY 1955 NO. 2



X415 m21 WSSSP
1955.12.12

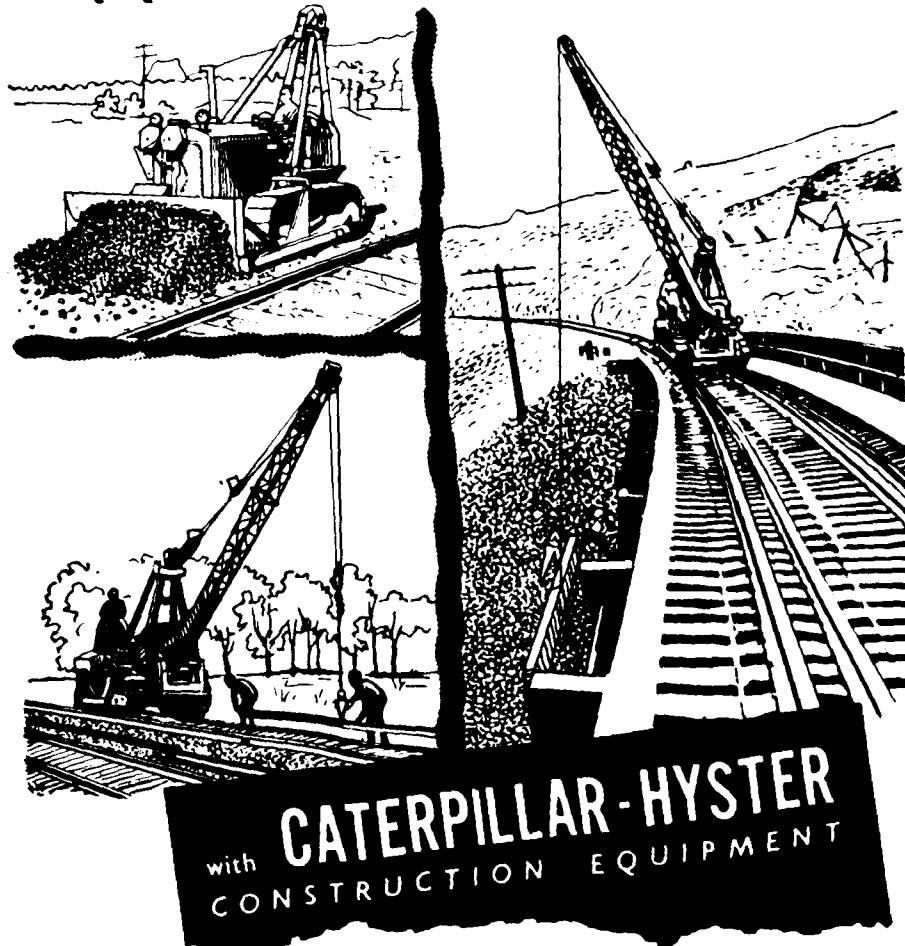


mas Six

APPROACH TO CITY



Keep your Rolling Stock **ROLLING..**



LESS TIME — LESS LABOUR — LESS COST

Dependable Mobility of 'CATERPILLAR' Track type Tractor coupled with versatility of 'HYSTER' Hystaway can accomplish various operations involved in construction, repair, relocation and maintenance of Railway Track — can work ON or OFF the Tracks with minimum lost time due to disruptions from main-line traffic.

Fitted with "Track-walking Shoes" this versatile unit combines in one

machine the usefulness of Bulldozer, Excavator, Crane and Pile Driver which performs such varied tasks as grading, laying rails, clearing ditches, installing culverts, pile driving and many other railroad maintenance tasks.

And the HEART of this unit is 'CATERPILLAR' Diesel Engine, world-renowned for its efficiency, dependability, low operating cost and long life.

For further details please contact:

CALCUTTA
TRACTORS (INDIA) LIMITED
P.O. Box 323

BOMBAY I
LARSEN & TOUBRO LIMITED
P.O. Box 278

NEW DELHI
WILLCOX (BUCKWELL-INDIA) LIMITED
P.O. Box 289

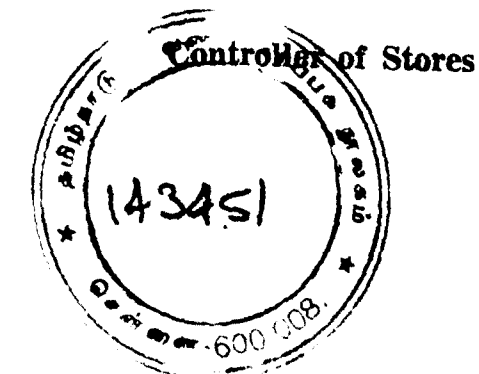
NOTICE

THE SOUTHERN RAILWAY AND THE INTEGRAL COACH FACTORY have pleasure in inviting you to the Show Room displaying exhibits of imported items of Railway Equipment at the Canteen Hall (Integral Coach Factory, Perambur) at the foot of the overbridge near the Loco Works Station. The Show Room will be open for the Public from 2-6-55 to 31-7-55, between 8-30 a.m. and 12-30 p.m. and from 3-30 p.m. to 6-30 p.m., except on Sundays, holidays and Saturday afternoons.

The Show Room is intended to give an opportunity to Manufacturers to examine the various exhibits and obtain full details regarding their consumption with a view to considering the feasibility of extending their existing plant or setting up new Industries in India for producing such items which are at present being imported.

Further enquiries in this connection may be addressed to the Officer-in-charge of the Show Room, Telephone No. 55653.

Perambur,
Madras-23



RAILWAYS TO ENCOURAGE NEW INDIAN PRODUCTS— OFFER TO ARRANGE TRIALS

The Ministry of Railways is anxious that self-sufficiency in regard to items of railway stores which are at present procured from abroad should be achieved as quickly as possible by locating and developing manufacturing capacity for such items within the country. The Railway Equipment Committee has been set up for this purpose, and while this committee is carrying out its investigations, the Railway Ministry considers it necessary that every opportunity should be taken to go ahead with schemes for achieving self-sufficiency.

At the Railway Centenary Exhibition held in 1953 important articles peculiar to railway requirements which are not manufactured in the country were displayed for the information of the trade and the interested manufacturers. The railways are also considering arrangements for their personnel to visit industrial units to create a spirit of mutual help and understanding between the user and the manufacturer in order to develop the indigenous manufacture of imported items. In this drive for self-sufficiency, however, there can be no compromise as regards the standard of articles used on the railways, as the consequences of a fall in standards can be disastrous.

The Ministry of Railways will be glad to entertain new products as may be of particular use to the railways. If a new product offered promises to be of use to the railways, taking into consideration technical, economical and other aspects, necessary trials will be arranged, and if as a result of trials a

product is found to be satisfactory, it may be standardized for use on all railways in consultation with them.

Work relating to initiation of trials with new products and advice regarding their development would be handled by the following officers in the Central Standards Office for Railways, "N" Block, Raisina Road, New Delhi: For carriage and wagon items—Chief Design Engineer (Carriage and Wagon); for track and building items—Chief Design Engineer (Civil); for signalling items—Chief Design Engineer (Signals); for locomotive items—Chief Design Engineer (Locomotives), Central Standards Office for Railways at Chittaranjan. In case of doubt, correspondence may be addressed to the Chief Design Engineer-in-Charge, Central Standards Office for Railways, "N" Block, New Delhi.

The General Managers and departmental heads of Railways can also undertake trials of suitable new materials offered by local manufacturers. The successful result of these trials on any one railway would not, of course, indicate that the product would be equally suitable for use on all railways under varying conditions.

The Ministry of Railways hopes that manufacturers interested in supplying railway equipment, which is at present imported, will develop the required capacity so that purchase of these items from abroad may be eliminated as early as possible. This would at the same time, help towards the establishment of new industries and the expansion of existing ones.



THE TOUGH JOBS GO TO CALTEX

ROLLING STOCK FOR EXAMPLE

Effective lubrication keeps passenger and goods trains running efficiently, and at low maintenance cost. Only the finest lubricants will do: so Caltex takes pride in the fact that Indian Railways use their:-

- Superheat Steam Cylinder and Valve Oils
- Compressor Oils
- Machine & General Bearing Oils
- Bearing Oils
- Axle Oils
- Ball & Roller Bearing Greases
- Driving Journal Grease
- Gear Lubricants

PLUS CALTEX TECHNICAL SERVICE

CALTEX PETROLEUM PRODUCTS



NORTH-EASTERN RAILWAY

WHILE MAKING THE
NEXT PILGRIMAGE

WHY NOT
VISIT

1. MATHURA ~ The Birth-place of Lord Krishna
2. VRINDABAN ~ The Holy City famous for Temples
3. BANARAS ~ The Holy Centre of the Hindus
4. KAMAKHYA ~ The Centre of Tantric Worship in India
5. KASIA ~ The Scene of Buddha's Mahaparinirvaha
6. SARNATH ~ Where Lord Buddha Preached his First Sermon
7. AYODHYA ~ The Birth-place of Shri Ram Chandra



PUBLIC RELATIONS OFFICER

NORTH-EASTERN RAILWAY

GORAKHPUR

TAKE THE STRAIN



WITH

GKW

HIGH QUALITY

FASTENINGS

MADE IN INDIA BY

GUEST, KEEN, WILLIAMS, LTD.

CALCUTTA—BOMBAY—MADRAS—NEW DELHI.

[illegible]

Represented by :
THE GENERAL ELECTRIC COMPANY
OF INDIA LTD.
 Calcutta . Bombay . Madras . Kanpur . Delhi
 Bangalore . Coimbatore . Secunderabad



A high-contrast, black and white photograph of a Weipert lathe machine. The machine is shown from a low angle, emphasizing its industrial design and mechanical components. The image is dominated by the dark, metallic structure of the lathe, with bright highlights reflecting off various surfaces. The background is white, and the machine is set against a backdrop of several parallel diagonal lines that create a sense of depth and perspective. The overall aesthetic is that of a mid-20th-century industrial advertisement.

AGENTS:

I, ROYAL EXCHANGE PLACE, CALCUTTA—1

NATIONAL PROSPERITY *needs*

More Roads



More Power Projects

More Schools



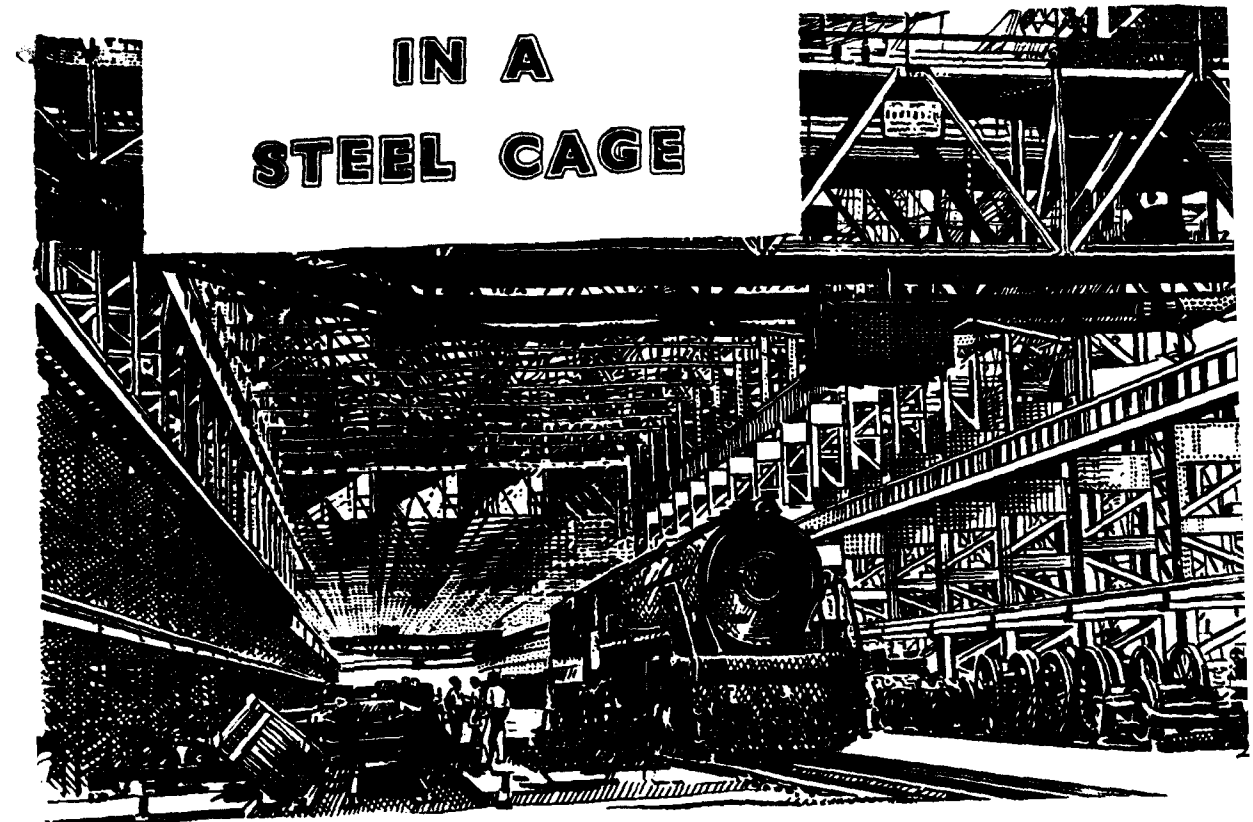
More Hospitals

BUILD THEM WITH

SANKAR BRAND  PORTLAND CEMENT

THE INDIA CEMENTS LTD., MADRAS - 1

THE IRON HORSE IN A STEEL CAGE



Chittaranjan is the largest locomotive manufacturing unit in Asia, designed to build 120 locomotives and 50 spare boilers every year under single shift production. In the construction of these immense workshops no less than 11,000 tons of STEEL were used.

The largest structure in the whole Project is the Main Assembly Shop, which measures 1560 feet long, 212 feet wide and rises to

a height of 75 feet. From this massive workshop roll India's locomotives—the visible results of the new industrialisation of India.

**STEEL FOR
PROGRESS**

THE INDIAN IRON &
IISCO
STEEL COMPANY LTD.

INSERTED BY

MANAGING AGENTS: MARTIN BURN LTD.

CONCRETE FOR THE RAILWAYS

Concrete is of inestimable value in the construction of station buildings, platforms, bridges, signal posts, car washing platforms, staff quarters, and various other structures needed by the railways.

The moderate first cost of concrete structures—plus their long life and low maintenance—results in true low annual-cost service.

Concrete signal gantry ▶

Precast concrete fencing in railway yard

Build to last with
ACC cement

Signal cabin

Concrete ash pit

**THE ASSOCIATED CEMENT
COMPANIES LIMITED**

Sales Managers:

**THE CEMENT MARKETING
COMPANY OF INDIA LIMITED**

SOUTHRAILNEWS

(Official Organ of the Southern Railway)

VOL. II

No. 2

MAY 1955

Editor:

K. SRINIVASAN

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.

The Editor does not assume any responsibility for the accuracy of the news supplied by correspondents or for opinions expressed by contributors. Opinions expressed in the Southrailnews whether editorially or by contributors should be regarded as having no official authority.

	Annual Subscription.	Single copy.
	Rs. a. p.	Rs. a. p.
Railway Employees ...	3 0 0	
Others ...	4 8 0	0 6 0

Subscribers are requested to inform the management of the change of address, if any, well in time to avoid misdelivery of copies.

Railway employees drawing a salary of Rs. 200 and over, can pay the subscription through their salary bills, and others should remit the full amount by M.O. to

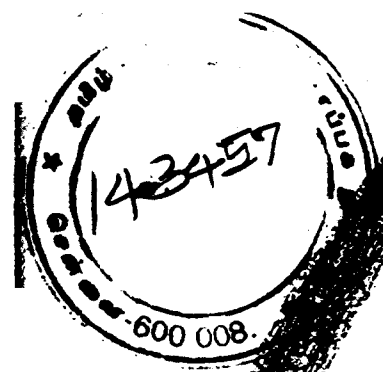
THE EDITOR
Southrailnews
18A Mount Road Madras 2

Page

11	Editorial
13	Notes and Comments
19	Overseas Newsletter
23	Where is that Wagon?
25	Railways in Parliament
29	Miscellany
33	Ticketless Travel and How to Eradicate it
41	Medical
43	Common Traits of Human Character
45	Perur—or 'Mel' Chidambaram
46	What is Production?
49	Women's Page
51	Children's Corner
53	S. R. News
57	Lepakshi
62	Special Rates
73	Building a New India
77	Commercial Newsletter
77	Staff News

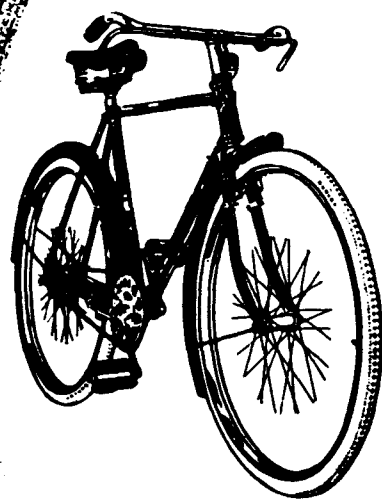
Cover page : Approach to Ootacamund

(Photo : G. S. Raju)



Quality BICYCLE

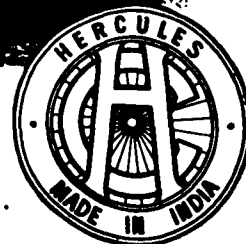
HIGH TRIBUTE TO INDIAN PRODUCT!



"The HERCULES bicycles manufactured by the Ambattur factory have attained a standard equal to those manufactured in England". This is the considered verdict of British experts who visited our factory and studied its working during recent months.

Look for the world-famous trade-name and mark of

Hercules



Manufactured by:

T. I. CYCLES OF INDIA LTD., MADRAS.

AVAILABLE AT ALL LEADING DEALERS

SOUTHERN RAIL NEWS

Vol. II

MAY 1955

No. 2

Importance of Reputation and Discipline

REPUTATION : It was said of British Hon'ble Members of Parliament that what was required of them was that their conduct should be such that the faintest breath of scandalous suspicion perishes because of its absurdity. This is applicable to Government servants also everywhere. This means every one who is a Government servant should have a reputation which is above suspicion. These are days of democracy when Government servants are treated as servants of the public. Government servants and officials should not have a party label or a party ticket or indulge in political activities. They are only concerned with rendering service in the position in which they are placed. The importance of discipline can be explained as under :—

Unless there is a head to lead and hands to follow, no work can be turned out. Each official has got a function irrespective of inferior or superior status. If in India we have a Sovereign Democratic Republic it is all the more reason why efficient service should be rendered. Freedom does not mean the right to do as one wants to do, but the liberty to do as one ought to do. Freedom should not be confused with licence. To put it simply as Mahatma Gandhi visualised, discipline may mean having a charter of duties ; to speak the truth, to do one's work, to do the right thing, to obey elders and also superiors. It may not be confused with a charter of rights. Charter of rights was promulgated by H. G. Wells, while charter of duties was promulgated by Mahatma Gandhi which includes a code of discipline. Mahatma Gandhi desired all citizens of India including Government servants to observe a code of discipline and charter of duties. It is necessary to rear to the most perfect vigour and maturity, every sort of generous and honest feeling that belongs to our nature, to bring the dispositions that are lovely in private life into the conduct of service and service to the nation and humanity.

Social Education on Railways

THE object of the Social Education Publicity contemplated by the Railways is to explain to the people what amenities the railways provide for them and how to make best use of them. The scheme also contemplates requesting the travelling public on the need for co-operation with the Railway authorities in the maintenance of cleanliness and orderliness in the station premises and in trains.

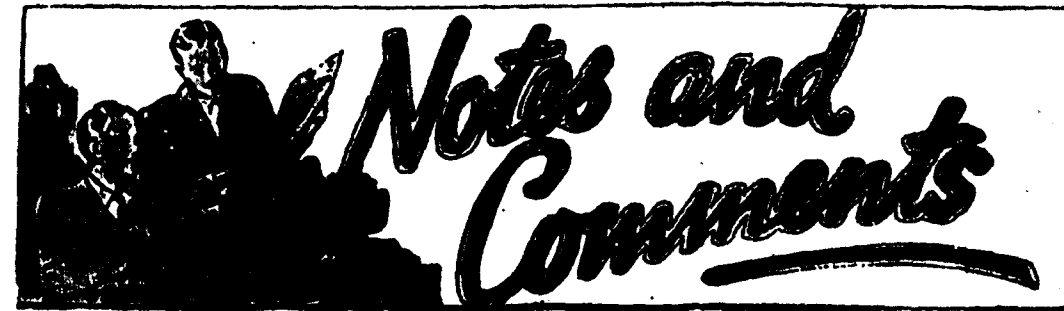
The Railway Board Three-Man Delegation, which went to Russia, headed by Shri S. S. Vasist, in its report, said that Soviet Russia and German Railways had made considerable progress in giving Social Education to passengers. The passenger trains on the Soviet Railways have radio receivers in each compartment connected with a radio room on the train. The radio is utilised to educate passengers in safety methods and general civic responsibilities. On the German Railways, cinema also has been provided at large stations where films are shown free of charge to bona fide passengers.

As a result of the latest discussion held during April in the Railway Board between the Railway Board Officers and Public Relations Officers

of various Railways, it was decided that oral publicity should come first. Loudspeaker announcements in English and in Regional semi-humorous languages should be couched, perhaps with a touch of sarcasm. The use of tape recorders or gramophone records should be considered to keep up an even performance.

With regard to film publicity it has been decided that with the assistance of I. and B. Ministry the films will be circulated on Indian Railways. While the need for social education among passengers is apparent, there is also need for educating Railwaymen on this subject. It is the responsibility of the railway staff to see that cleanliness is maintained in carriages, platforms and railway premises. While expecting passengers to discourage hawkers and beggars coming into the platform the Railwaymen should also see that they do not allow them into the station and if they are found, suitable action should be taken to deal with them.

As for printed publicity in the form of posters, handbills, folders, etc., oral publicity and film publicity have to be watched for some time before deciding on printed publicity which has to be carefully planned and executed.



PAMPHLET OF RAILWAY TERMS IN HINDI

RAILWAY NOTICES BEING STANDARDISED IN HINDI

The Government of India have published a pamphlet containing a provisional list of railway terms in Hindi under letters 'A' to 'H' and copies have been circulated to State Governments, railway administrations and some learned bodies in the country for suggestions and comments. The Expert Committee on Railway Terms has so far examined Hindi terms up to the letter 'M' and work on the remaining terms is on hand. These steps are part of a plan devised by the Railway Ministry to popularize the national language. Work is in progress for standardizing in Hindi name-boards, notices, etc., displayed on railway premises and in trains. The Railway Board's Hindi Officer is being deputed to go out on the railways and try and expedite this work. All zonal Railways now publish railway time-tables in Hindi simultaneously with English, while the first All-India railway time-table in Hindi was published on October 1, 1954. A periodical scrutiny of these time-tables is undertaken in the Railway Board's Hindi Section has been strengthened and staff under the Railway Board has been advised to acquire knowledge of Hindi before the expiry of the 15-year period laid down in the Constitution. The question of providing facilities for learning Hindi to railway staff posted at outstations is also under the Railway Board's consideration. The Railway Minister's budget speech last February, the budget statement, the

explanatory memorandum and the pamphlet "Towards Better Conditions of Travel" were published simultaneously in English and in Hindi. It is intended to bring out the Hindi version of the important budget documents with effect from 1956-57. Under instructions from the Railway Minister, replies to Parliament questions which are originally tabled in Hindi are now being furnished in that language, in addition to the usual reply in English.

NEW 44 MILE RAIL LINE TO BE CONSTRUCTED ALTERNATIVE ROUTE BETWEEN KANDLA AND DELHI

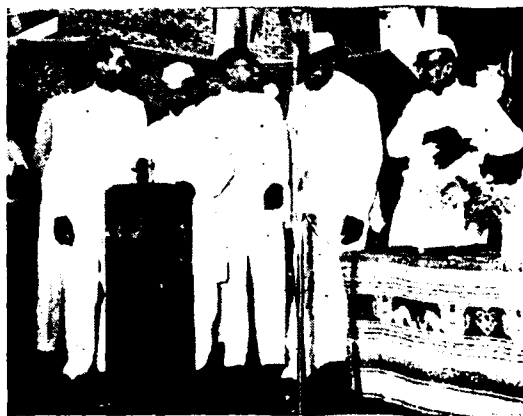
The Railway Board has sanctioned the construction of a new 44-mile metre gauge railway line from Bhiladi to Raniwara, on the Western Railway. When completed, the new line would connect the Kandla-Deesa line with Raniwara and join the metre gauge system in Jodhpur with the metre gauge system in Saurashtra and Kutch. It will also provide an alternative main line connection between Kandla and Delhi as well as other important points on the metre gauge system. The new route will provide a shorter connection between Kandla port and a large portion of its hinterland in Rajasthan, Pepsu and Punjab.

The Bhiladi-Raniwara link will reduce the pressure on the line between Palanpur and Marwar Junction, and the railways will be able to better handle and carry the large volume of traffic expected to develop at Kandla Port for carriage to and from the hinterland.

OPENING OF BHUJ-GANDHIDHAM METRE GAUGE LINE

The Bhuj-Gandhidham Metre Gauge Line was opened by Shri Lal Bahadur Shastri, Minister for Railways and Transport, on 7th April, 1955 at Bhuj. The opening of the section was done by the Minister by pulling a lever which electrically operated the lowering of the signal, letting the first train to move into the section.

The newly opened section provides a through rail link from Bhuj, capital of Kutch State, to the rest of India which will now have a direct rail access

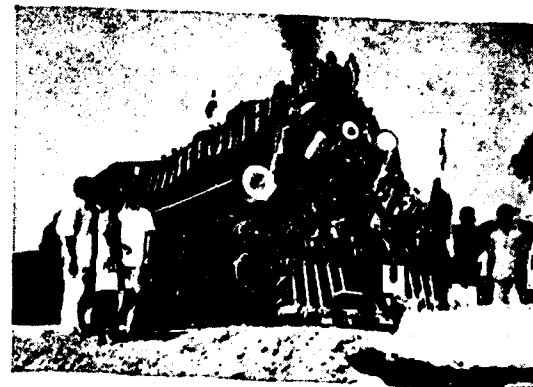


Shri Lal Bahadur Shastri pulling a lever which lowered the signal for the first Metre Gauge train from Bhuj to Gandhidham

to Kandla Port. The new line is also expected to help the State both economically and strategically.

The project consisted of the conversion of the 30 mile Narrow Gauge link between Bhuj and Adipur to Metre Gauge, and the construction of a new line of about 6 miles between Adipur and Gandhidham. The working of construction cost about half a crore of rupees, and, in spite of the difficulty in obtaining materials, has been completed within 9 months.

Shri Shastri, speaking on the occasion, outlined a Five Point Scheme



The first Metre Gauge train leaving Bhuj for Gandhidham on April 7, 1955

for the development of railways in the Second Five Year Plan. He stated that the chief features of the proposed development would comprise of:

- (1) Provision of 5,000 miles of new lines including about 1,000 miles of doubling of lines;
- (2) The complete rehabilitation of railway rolling stock, like wagons, coaches, engines and provision of adequate steel for tracks;
- (3) Increase in line capacity so that the traffic bottlenecks may be removed specially in Saurashtra, Vijayawada, Madras, North Bengal and Assam;
- (4) Complete self-sufficiency in rolling stock; and
- (5) Setting-up of a new factory for manufacturing electrical multiple coaches in India and greater utilisation of electric power for running more trains.

The Minister stated that in the Second Five-Year Plan, the Chittaranjan Factory and the Tata Workshops at Jamshedpur would have to step up the manufacture of locomotives from 200 to 300 per year and from 50 to 100 per year respectively. He also declared that it was the policy of the Railway Ministry to abolish the

narrow gauge lines in the country in gradual stages.

Earlier, Shri P. N. Saxena, General Manager, Western Railway, while welcoming the guests, appealed to the people of Kutch for co-operation in assisting the Railway Administration in carrying out their plans.

OPENING OF GANDHIDHAM STATION

Over 6,000 people witnessed the Minister declaring open Gandhidham Station by pressing a button which illuminated the station.

The Station building at Gandhidham has been designed to meet the needs of the new township of Gandhidham, the developing port of Kandla and their future requirements.

The new building has been constructed at a cost of Rs. 6½ lakhs and it is designed as an earthquake-resisting structure, as Gandhidham lies in the seismic zone. The station has all the modern facilities such as retiring rooms, large waiting rooms, extensive waiting halls and refreshment rooms. For the first time on the Western Railway retiring rooms with a slightly smaller standard of accommodation, but at very much cheaper rates for the public have been introduced in this station.

The Railway Minister, while addressing the gathering, expressed satisfaction that the newly-built station would

adequately meet the need for increased passenger amenities in this area. He stated that the Railway Board had embarked on a Five-Year Passenger Amenities Programme involving an annual outlay of about Rs. 300 lakhs. He emphasized the desirability of introducing vestibule coaches on all trains which would minimise crime and relieve overcrowding.

Earlier, Shri P. N. Saxena, General Manager, Western Railway, while requesting the Railway Minister to open Gandhidham Station building and welcoming the guests, stated that the new station equipped with up-to-date amenities, was one of the most modern stations on this railway.

2,600 WAGONS DELIVERED IN A MONTH

Nearly 2,600 new goods wagons were delivered to the Indian Railways during January 1955, according to returns just compiled. All these were manufactured within the country.

At the end of January, the railways had on order 26,000 wagons. Delivery for a major portion of this stock is programmed for 1955-56, and the entire lot is scheduled to come in by the end of March next year.

Out of the wagons delivered during January, only 300 were metre gauge wagons and the balance broad gauge wagons.

A view of the gathering on the occasion of the opening of Gandhidham Station



'The most useful piece of equipment we have'

Typical of many such remarks applied to the Wickman Optical Profile Grinding Machine is this considered statement made by a tool-room supervisor recently. And calling to mind some of the complicated and uncertain grinding improvisations that were previously the order of the day, his satisfaction can be understood.

For the production of intricate profiles in hardened steel or tungsten carbide, for gauges, form tools and punches and split dies for press tools, there is no simpler system, nor one which offers such universal application.

The preparation of a pencil drawing of the contour 50 times larger than the form to be produced is the only preparatory work required. This is applied to the drawing table on the machine and used in conjunction with the

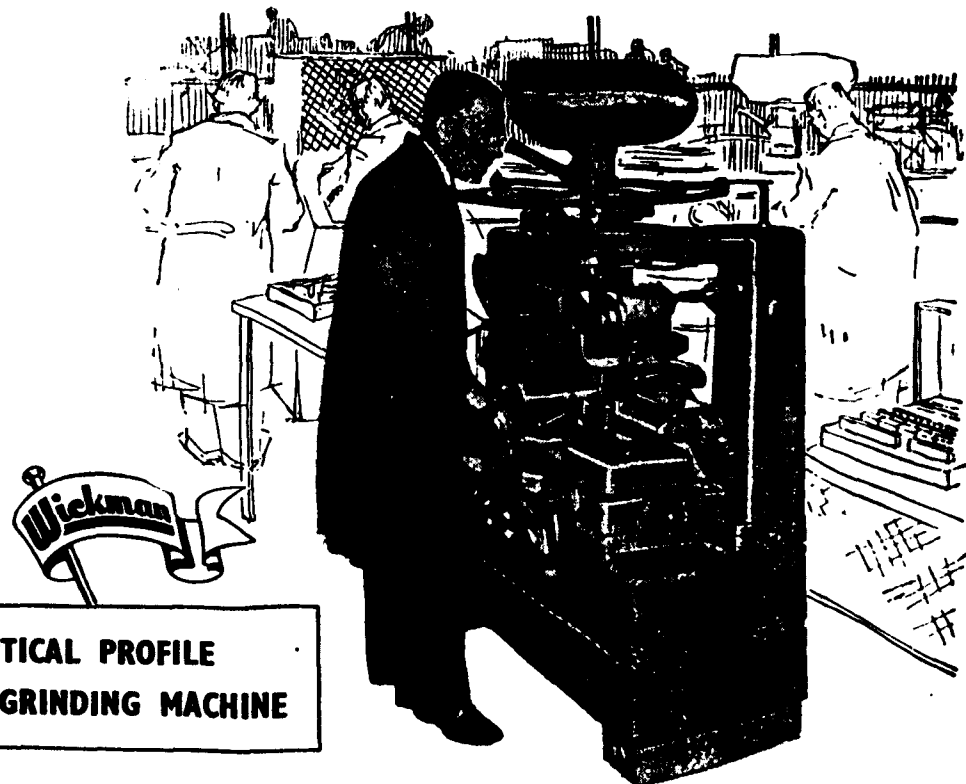
pantograph system to trace the required profile.

A microscope is incorporated in the final arm of the pantograph whose path follows the tracing point, outlining the correct profile, the path of the grinding wheel then being traversed by manual control to the cross hair lines of the projection unit.

Accuracy of the work is not affected by wheel wear, and specially shaped wheels are not required.

INTRICATE PROFILES ACCURATELY REPRODUCED.

By the combined use of the compound slides, set to vernier scales, and the pantograph positioned microscope, profiles can be simply and positively produced to limits of accuracy frequently closer than 5/10th of a 'thou'.



**OPTICAL PROFILE
GRINDING MACHINE**

Write for full details to the
sole agents for India.

MACHINE TOOLS (INDIA) LTD.
CALCUTTA · BOMBAY · BANGALORE

RAILWAY CORRUPTION ENQUIRY COMMITTEE

The Railway Corruption Enquiry Committee has completed the collection of evidence and is now at the stage of finalising its report. Members of the public are, therefore, requested not to address any personal complaints to the Committee, but to send these to the appropriate Railway or police authorities.

SHOW ROOMS FOR RAILWAY EQUIPMENT

The Railway Board, it is learnt, has approved the opening of four show rooms, one each in Delhi, Calcutta, Bombay and Madras, to display samples of all types of imported items of railway equipment.

The show rooms are being opened at the instance of the recently appointed Railway Equipment Committee which is charged with the task of recommending steps for achieving the largest measure of self-sufficiency within the country in respect of railway equipment.

The show rooms are intended to help existing and potential manufacturers of railway equipment, who can see for themselves the stores which they are being asked to manufacture for the Indian Railways.

1,500 VOLT D.C. ELECTRIC LOCOMOTIVE

The 4,000 h.p. BB 9004 electric locomotive is a prototype of entirely French design and construction which has already covered nearly 100,000 miles since it came into service in 1953 without giving any mechanical trouble whatever and French engineers estimate that a mileage of 375,000 will be possible without major overhaul.

Three other prototypes of this class which, however, have certain variations in their mechanical and electrical equipment are in service on the French Railways and as they have given full satisfaction, the French Railways have ordered 9 more locomotives of this type for their future electrification of the Dijon-Vallorbe line.

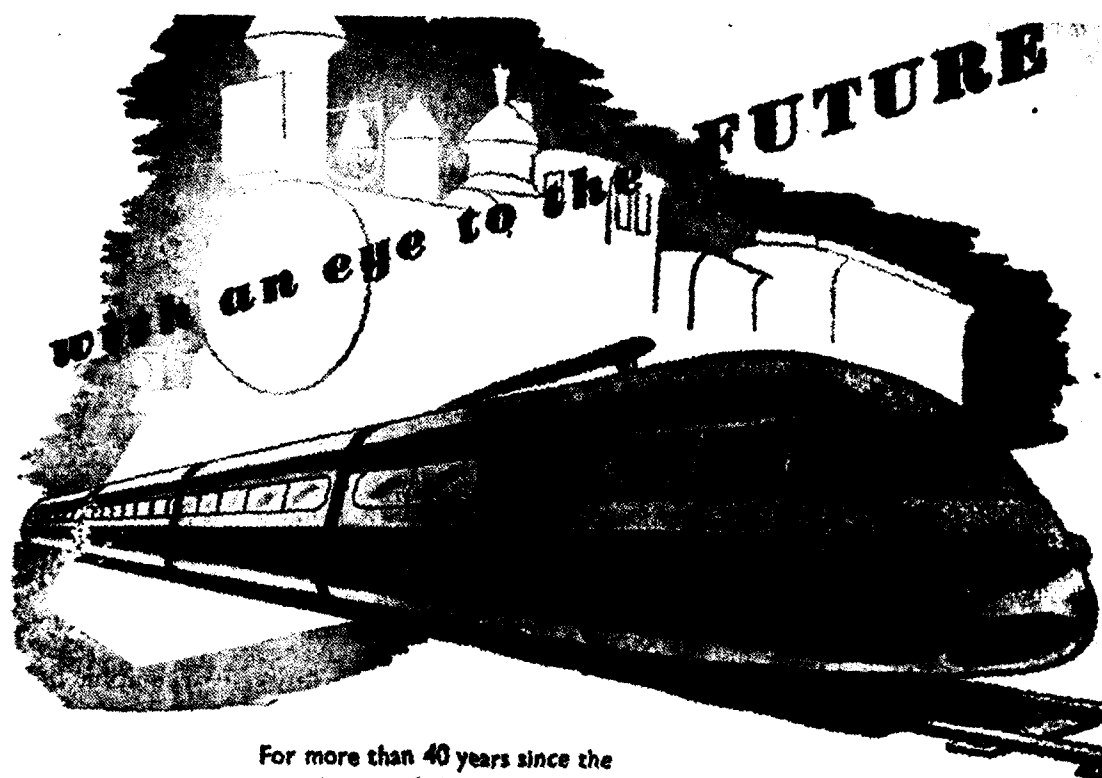
These engines which cost £95,000 and have a total weight of 79 tons are much cheaper and lighter than the 2-D-2' or CC's built for the electrification of the Paris-Lyon main line. Extensive and exhaustive trials have demonstrated however that they can haul very heavy trains at high speeds. For example, the BB 9004 recently covered the 318 miles between Lyon and Paris hauling a train of 814 tons at an average speed of 79.5 miles per hour—a remarkable performance for a locomotive weighing only 79 tons on a run with a gradient of 1 in 125.

AWARDS TO RAILWAY SERVANTS FOR SUGGESTIONS AND INVENTIONS IN REGARD TO RAILWAY WORK

The attention of staff is invited to the functioning of a "Standing Screening Committee" (Inventions and Suggestions) at the Headquarters for examining all Suggestions and Inventions received from Railway Staff as well as members of the public.

Any member of the staff desiring to submit his suggestion or invention should send it to the Secretary, Standing Screening Committee, General Manager's Office, Madras.

Suggestion boxes are also being provided at Workshops, bigger sheds, certain of the important Stations and Offices to facilitate staff in submitting their Suggestions.



For more than 40 years since the introduction of the first electric lighting on Indian Railways, CHLORIDE 'LUX', and later EXIDE-IRONCLAD Batteries have been the first choice of Railway Engineers. Since air-conditioning was introduced, EXIDE-IRONCLAD Batteries have been fitted on air-conditioned coaches in service in India. EXIDE-IRONCLAD Batteries are fitted also on the new Swiss Lightweight coaches on the Indian Railways.



Our battery designers with many years practical experience of the arduous climatic and operating conditions of this country have produced a battery unsurpassed for efficiency, reliability and long life... and with an eye to the future they continue endlessly the research for new materials, and new designs, to give you batteries that will be even better than the best we know today.

Exide-Ironclad

CELLS FOR TRAIN-LIGHTING, FANS
AND AIR-CONDITIONING

for CARS, TRUCKS, TRACTORS & BUSES
The New *Silver* Exide BATTERIES with PORVIC

— the Separator which is virtually indestructible in service

A PRODUCT OF CHLORIDE & EXIDE BATTERIES (EASTERN) LTD.



World of Railways

Arthur L. Stead

Our London Correspondent

AS railwaymen on either side of many international frontiers shake hands with one another, instead of fists, travel throughout the world becomes easier, swifter and pleasanter.

Amidst all the massive post-war rehabilitation and reconstruction, the lifting of transport restrictions as between one country and another, stands out as a genuine achievement. There is no better way of learning how the other fellow lives, and appreciating his problems, than by meeting him in his own surroundings. That is very much the way of peace, and an endeavour to which railway folks throughout the globe can take immense pride in contributing.

In Europe, things are moving fast towards the complete removal of irritating barriers to long-distance rail movement. Frontier restrictions are being lifted, new trains and modern equipment introduced, and substantial cuts made in the timings of the international expresses.

Actually, long before the United Nations or its predecessor—the League of Nations—was thought of, the railways of the world set up their own co-operative body, the International Railway Congress Association, to bring into friendly touch the rail systems of the globe. The I. R. C. A. continues to perform splendid service, and it is

thanks to one of its off-shoots—the European Timetable Conference—that unrestricted travel across Europe now is assured.

Europe's "free-flow" timetables operate as from May 22, with the introduction of the summer passenger train schedules. The new tables are the result of extended negotiations between the various systems which reached finality at a get-together of European operating experts in Budapest, Hungary, late last year.

The Budapest conference was attended by delegates from every European rail undertaking, from Britain in the west to Russia and Turkey in the east. Naturally, long-distance rail working in Europe is constantly up against the fact that the Continent is divided into numbers of separate lands, often at variance politically and having differing Customs, passport and other regulations. However, the railways have always tried to keep open routes linking their systems with other lands, leaving politics to the politicians.

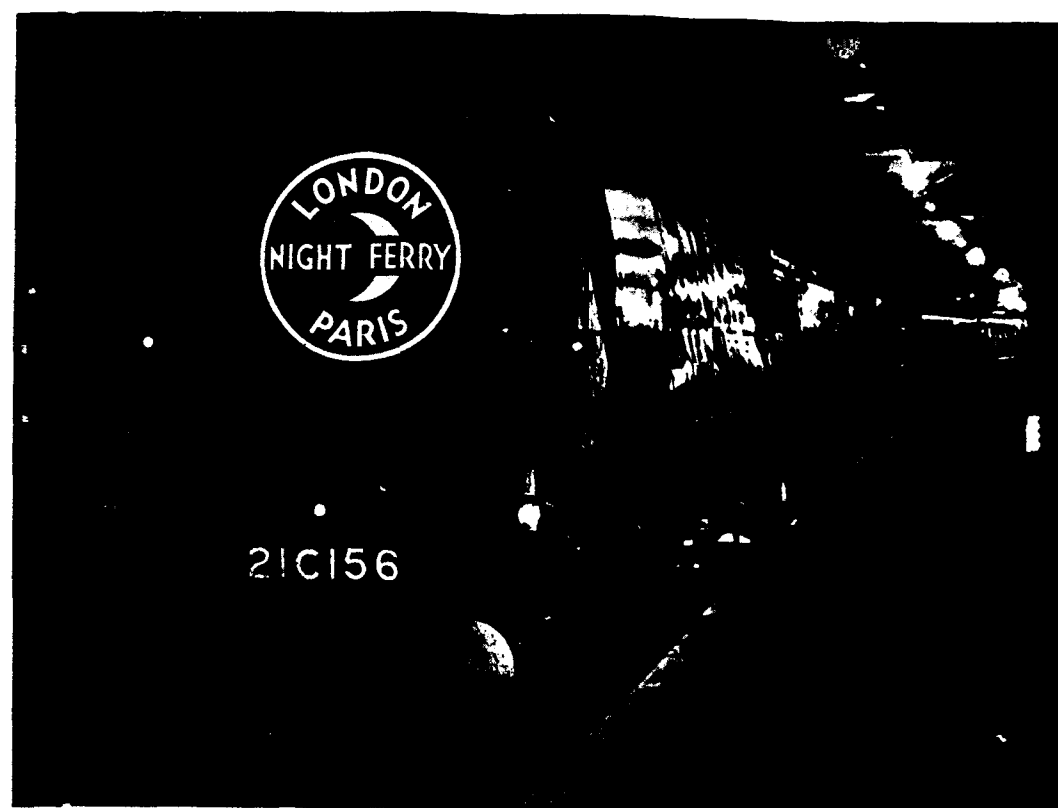
Ever since 1945, it has been possible, by sensible "give-and-take", to maintain skeleton services right across Europe. Today, the railways are redoubling their efforts to expand the international rail links, and we have an early reflection of this endeavour in the vastly improved train services now commencing to operate.

Almost every European railway derives much of its revenue from interchange traffic with foreign systems. Although Britain is an island, this feature is much apparent in the operation of British Railways, and to all intents and purposes London is the western terminal of the principal international rail services cutting across the Continent for 2,000 miles or more.

There are several gateways from London to the European mainland, but

service is the London-Dover-Calais-Paris "Golden Arrow"; and the night service the London-Dover-Dunkirk-Paris "Night Ferry", conveying passengers in through-sleeping cars between the English and French capitals.

From and to Liverpool Street Station, London, there are operated by the Eastern Railway fine boat trains feeding the fast modern steamships connecting Harwich, England, with the Dutch



two are of prime importance. One is provided by the Southern Railway via the Channel port of Dover, and the other by the Eastern Railway via the North Sea port of Harwich.

From and to Victoria Station, London, the Southern operates two outstanding continental trains, linking up across the Channel with long-distance expresses of the French Railways linking all European centres. The daylight

port of Hook of Holland, western terminal of several leading trans-continental trains.

On the mainland of Europe, the longest through run is that of the "Simplon-Orient Express", traversing the whole of Southern Europe, from Calais to Istanbul (Turkey), a distance of 2,075 miles. This train passes through France, Switzerland, Italy, Yugoslavia, Bulgaria, Greece and

Turkey, and obviously presents ticklish problems for the timetable jugglers. This summer, the "Simplon-Orient" through timing is cut by 95 minutes following accelerations in Greece and Yugoslavia, and a feature (in line with what is being done in India) is the introduction for the first time on this hitherto limited luxury express of third-class accommodation between Paris and Istanbul.

Improved connections with Eastern Europe are being given by the "Simplon-Orient's" sister service—the "Orient Express" (Calais-Strasbourg-Salzburg-Vienna - Budapest-Bukarest). Every day, this train now includes a through sleeping car in each direction between Paris and Prague, in the heart of Czechoslovakia, and Warsaw, the Capital of Poland. Both these latter points have hitherto been somewhat difficult to reach from the west.

Between London and Paris and Scandinavia, there are two outstanding through expresses. One is the "Nord Express" (London - Paris - Ostende-Brussels-Cologne-Bremen - Hamburg-Copenhagen-Malmö - Stockholm-Oslo); and the other a new train, the "Paris-Scandinavian Express", serving Belgian, Dutch, German and Danish centres between Paris and Oslo (Norway), and giving next day arrivals from London and Paris in Scandinavian cities.

A long string of accelerations in the summer timetables covers the London-Paris-Rome and London-Paris-Madrid-Lisbon services. The "Paris-Rome Express" is now hauled by electric locomotive throughout, with a saving of 87 minutes in the through timing. Via the fine "Sud Express"—also electrically-hauled—the journey time between Paris and Madrid is cut by 90 minutes, and between Paris and Lisbon by 75 minutes.

Greatly improved services to and from Yugoslavia are conspicuous in the new timetables. In addition to connections made by the "Simplon-

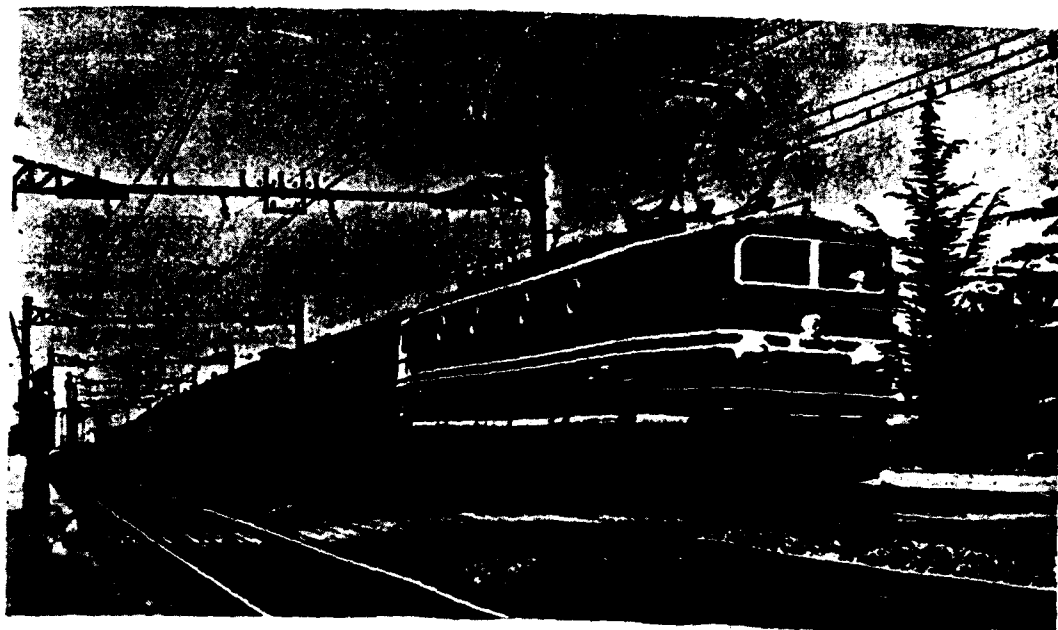
Orient" and other international services, an entirely new train—the "Yugoslavian Express"—is being introduced through from the Channel Coast and Paris to Belgrade and other Yugoslav points.

Radiating from the Dutch seaport of Hook of Holland are numbers of fast through trains serving Northern and Central Europe. One popular service is the "Holland-Scandinavia Express" to and from Denmark, Norway and Sweden. Another is the "Rhinegold Express" to and from Germany; While a third is the "Loreley Express" to and from Switzerland, which now includes through carriages for Munich and Belgrade.

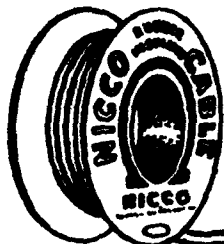
Based on Hook of Holland, there are introduced fast trains serving European points as far away as Vienna, Austria, and Genoa, Italy, all the new services including dining cars by day and sleepers by night. Most of these special vehicles are rented from the International Sleeping Car Company, an organisation which itself has done much to better international travel.

Hand-in-hand with the improvement of the European long-distance services, there has gone the betterment of main-line trains within the various countries. France has accelerated many of her internal train services following electrification, while a novel service is that of the unique pneumatic tyred expresses between Paris and the German border. In Germany, there are this summer new fast diesel trains between cities like Berlin, Hamburg, Basle and Frankfurt. Further south, new luxury electric services cover Italy from end to end.

In the extreme east of Europe, beyond Warsaw and Prague, the situation is not so happy from the viewpoint of the breaking down of travel barriers. Optimistically and patiently, however, the railways are working for the easing of restrictions and for the reintroduction of through



services with Russia and points on the Trans-Siberian route, an achievement which would be of the utmost value to the world at large.



India's Own India's Best

NICCO
CABLES & WIRES

NICCO Produces :
Copper Conductors, Solid, Stranded,
Aluminium Conductors, A. C. S. R.,
Rubber Insulated Cables, Flexibles,
Cotton Covered Wires, Enamelled
Wires etc.
All Strictly to Standard Specifications.

LIFE LINES OF THE NATION

NICCO is on Government of India Rate Contract and is a regular supplier to all Government and quasi-Government bodies.

THE NATIONAL INSULATED CABLE CO., OF INDIA LTD.
STEPHEN HOUSE, 4, DALHOUSIE SQUARE, CALCUTTA-1.
Agencies and Branches all over India

'Where is that Wagon?'

"Oprail"

BELIEVE it or not, a railway wagon can get lost, but it does not get lost in the ordinary sense of the term, or that somebody takes it off the track, and hauls it away to some country road to rifle its contents or use it as a temporary dwelling place. Then, how is it that a railway wagon does get lost?

A merchant goes along to a big goods shed and tenders for despatch some commodity that will fill a complete wagon. The destination of this wagon may be only two hundred miles away, or even over a thousand. The wagon is placed in the goods shed line for loading. When this process has been completed, the wagon is ready for its onward journey to destination. The goods shed staff issue the invoice, prepare labels, and complete all documentary procedure at forwarding point. In due time the yard pilot comes along, and pulls out this wagon along with several others from the goods shed line into the yard, where eventually the wagon is hitched on to its proper train. Before the long goods train rolls out of the station yard, the details of each wagon are noted by a number-taker in his handbook, and from the entries in this book, if the wagon starts from a large junction, booking particulars are transferred to other registers.

The wagon is now on its way. If the destination station is on another railway system, when it arrives at the junction interchange point, labels are again checked and particulars recorded in the junction registers. The wagon will also be taken off one goods train and attached to another during the process of marshalling in the junction yard. When the wagon reaches destination finally, it is detached from the train and pushed into the goods shed lines for unloading. The consignee at destination end now takes delivery of the contents of the wagon. When the

journey of a wagon from despatching to destination station goes as smoothly as this, every one is satisfied.

But an uneventful journey is not always the case. In spite of all the careful records maintained of each wagon at various points on its journey, some little error or omission may happen. A wrong entry of a figure or a letter or station code name by a clerk or number-taker, may be the cause of the particular wagon being sent into quite a different direction and destination. While waiting in passing sidings, or in large marshalling yards, a wagon label may be removed inadvertently. This will result in the wagon concerned being held up while correct booking particulars are being obtained from the forwarding station or stations already passed, so that the wagon can be sent on to correct destination.

These are some of the factors that lead to wagons being 'lost.' But as soon as a wagon has become overdue at destination, the telegraph wires start humming with messages to help find out the whereabouts of the missing wagon.

A large part of this wagon tracing on railways is usually done by Wagon Tracers or Wagon Chasers. As soon as a message is received by one of these Tracers about a lost or missing wagon, he will get started on the job of tracing. Patiently and step by step, from starting point to destination station, the Tracer will have to examine and sift carefully the detailed records of the movement of the wagon. This dull routine work is nothing like a detective searching for clues, but is the only way in which the whereabouts of the wagon can be traced. The tracing must be done as quickly as possible, as delays will result in a loss both to the merchant and the railway administration. As soon as the Wagon Chaser has tracked down the

truant wagon to its wrong destination, he will advise all concerned, and see the wagon moving to the correct destination.

Apart from tracing missing wagons, delays in getting loaded wagons through to destination often occur. Practically all railway staff whose work is connected with the movements of trains must be on the alert for any delays while a wagon is in transit. Apart from Wagon Tracers, it is an important part of a Traffic inspector's duties to keep a watch on the transit time of wagons. These supervisory staff, during their routine inspections, must keep a watch out for bottlenecks in yards, shunting operations, transshipment points, and so on. There are thousands and thousands of wagons rolling along each day over the various railway systems in the country, but it is not merely a question of keeping all

these wagons moving; they must go from despatching to destination stations in as short a time as possible, and then back with another load, or to a point where a load is waiting. Every hour that a wagon remains empty, or lies idle, means that the railway is losing revenue. The extent to which revenue can be lost can be gauged when it is realised that each railway system owns from ten to fifty thousand wagons.

"Where is that wagon?" or "When will that wagon reach destination?" These are questions often asked both by merchants and railwaymen. But the staff and the machinery available on a railway for the purpose are there to ensure that wagons move from despatching to destination points expeditiously; when due to errors of omission or commission wagons go astray or are lost.

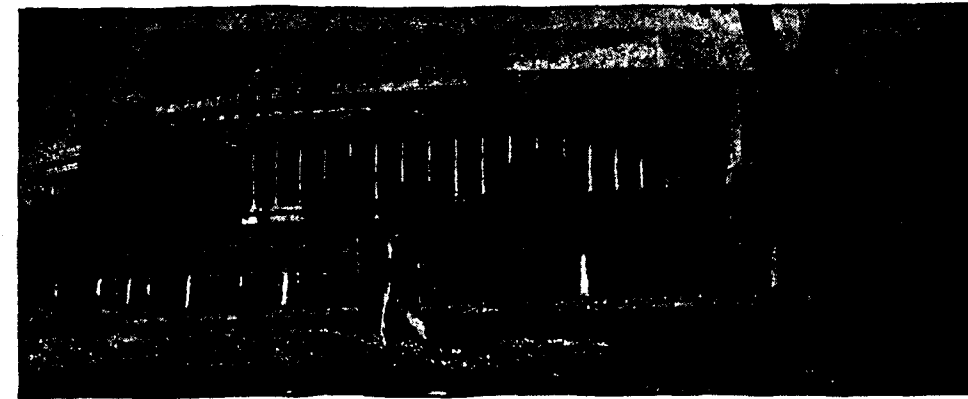
Dalmia REFRACTORIES

Suitable for stationary and rotary furnaces.
Manufactured in moderate, high and super heat.

DALMIA CEMENT (BHARAT) LIMITED
DALMIAPURAM (TIRUCHIRAPALLI)

On approved list of suppliers to Indian Stores Department,
Governments, Railways and Municipalities.

Misc. 133



Railways in Parliament

INDO-PAKISTAN RAIL TRAFFIC— DECISIONS TAKEN AT KARACHI

Shri O. V. Alagesan, Deputy Minister for Railways, stated in Lok Sabha on 25th April, 1955 that the following decisions had been taken at an Indo-Pakistan Meeting held at Karachi on April 12, 1955:

- (i) Rail traffic should be restored with West Pakistan on
 - (a) Kasur (Pakistan)-Ferozepore (India) and
 - (b) Khokrapur (Pakistan)-Munabao (India) routes with effect from June 1, 1955.
- (ii) Through services should be introduced between
 - (a) Lahore and Calcutta via Saharanpur;
 - (b) Lahore and Delhi;
 - (c) Lahore and Bombay via Delhi; and
 - (d) Hyderabad (Sind) and Ahmedabad via Khokrapur; and every endeavour should be made to commence the through service between Lahore and Calcutta from June 1, 1955.
- (iii) Traffic between West Bengal and North Bengal via East

Bengal should be resumed with effect from May 1, 1955.

The decisions, Sri Alagesan said, were awaiting ratification by the Governments of India and Pakistan.

OVER 10,000 QUARTERS FOR RAILWAY STAFF

The total number of quarters for railway staff expected to be completed during 1954-55 was 10,407 and the amount spent thereon approximately Rs. 462.88 lakhs, stated Shri Shah Nawaz Khan, Parliamentary Secretary to the Railway Minister during question hour in the Lok Sabha on April 28, 1955.

RAIL CONCESSIONS FOR KOSI WORKERS

Shri Shah Nawaz Khan said that upto the end of March, 1955, 17,400 persons taking part in voluntary work in connection with the construction of the Kosi Project embankment, were granted rail concessions. All these persons travelled in third class.

RAILWAY LINES IN SECOND PLAN

Shri Alagesan, Deputy Minister for Railways, stated in Lok Sabha on April 28, 1955, that proposals for the construction of new railway lines

The ALADDIN RAIL & WHEEL FLANGE LUBRICATOR

SIMPLE & EFFICIENT
for
ALL TYPES OF RAIL

DEPARTMENT OF RAILWAYS—NEW SOUTH WALES Aladdin Rail Lubricators

Aladdin Lubricators were first installed by this Department in 1933 on the Sydney Suburban Area. They proved so successful that by 1935 over 500 had been installed on electric tracks, and their use was extended to cover most sharp curves throughout the New South Wales Railways.

After some experience it was estimated that the average life of high rails on electrified lines had been increased from 4 to 15 years, and on main steam lines from 6 to 20 years.

There are now over 3,000 Aladdin Lubricators in service. Apart from saving in rail wear, they have been proved to effect a very considerable saving in the wear of wheel flanges.

Little trouble is experienced in maintenance. Lubricators are installed by a small specialised staff, who also supervise their operation and carry out repairs when necessary. Filling, cleaning and general care are carried out by the fettling staff in the course of ordinary duty.

To sum up, the Aladdin Lubricator is a simple device which performs in an efficient manner.

Reproduced by courtesy of the Secretary for Railways, New South Wales Government
3rd May, 1950

SOLE AGENTS FOR INDIA
SAXBY & FARMER (INDIA) LIMITED
17, CONVENT ROAD, ENTALLY, CALCUTTA

May 1956

RAILWAYS IN PARLIAMENT

27

during the second Five-Year Plan period had so far been received from all Part 'A' and Part 'B' States, except Andhra, and all Part 'C' States except Bilaspur, Delhi, Himachal Pradesh and Manipur.

CASES AGAINST FOOT-BOARD TRAVELLERS

The number of persons killed or seriously injured as a result of fall from railway trains was 1,609 in 1953 and 1,511 in 1954, said Sri Alagesan in the Lok Sabha on March 24, 1955. He continued that 9,343 cases had been instituted against persons found travelling on foot-boards and roofs of railway trains during 1953. The figure in 1954 was 5,355.

NEW RAIL LINES ON SOUTHERN RAILWAY

The money spent on the construction of new lines on the Southern Railway during 1953-54 recorded a more than six-fold increase compared to the previous year, the respective figures being Rs. 69,64,000 and Rs. 11,65,000.

The Deputy Minister for Railways said that the amount spent on the restoration of the old lines was Rs. 23,49,000 during 1952-53 and Rs. 31,74,000 during 1953-54.

The earnings of the Southern Railway during these two years were: 1952-53 (Rs. 44,36,34,000) and 1953-54 (Rs. 44,05,83,000).

ORDERS FOR ROLLING STOCK PLACED IN INDIA AND ABROAD

During 1953 and 1954, the Ministry of Railways placed orders on manufacturers in India for 18,107 wagons and 730 passenger coaches valued at over Rs. 24.07 crores. During the same period orders were placed on foreign manufacturers for 1,691 wagons and 124 passenger coaches valued at nearly Rs. 4.99 crores.

This information was given in a statement laid on the table of the Rajya Sabha during question hour by Sri O. V. Alagesan, Deputy Minister for Railways and Transport, in reply to a question by Shri M. Valliullah.

The foreign orders were placed on manufacturers in Belgium, France, Italy, Japan, Switzerland and the United Kingdom.

NEW LOCOMOTIVES ON LINE IN 1954

During 1954, 194 new locomotives were put into service on the Indian Railways, while during the same period 155 old engines were removed from service.

RAILWAY SCHOOLS

In a statement in reply to a question by Maulana M. Faruqi, Sri Alagesan said on March 28, 1955 that there were 145 schools under the management of the Indian Railways. Out of these, 94 were primary schools, 27 were middle schools and 24 high and higher secondary schools. There are no colleges under railway management.

RAILWAY CONCESSION TICKETS

The Indian Railways during 1954 issued concession tickets for 23 important fairs and festivals, besides circular tour tickets, return tickets for hill stations, rail-cum-road and rail-cum-air return tickets for Srinagar, third class cheap return tickets on certain sections, etc. The income from return tickets for hill stations between April 1 and October 31, 1954 was slightly over Rs. 18,97,000, while the income from concession tickets to Srinagar was about Rs. 7,04,000.

This information was given by Sri O. V. Alagesan, Dy. Minister for Railways and Transport in the Rajya Sabha on March 31, 1955.

SOUTHERN RAILWAY

TENDER NOTICE

SUPPLY OF WOODEN TRACK & SPECIAL SIZE SLEEPERS

Sealed tenders are invited by the Chief Engineer, Southern Railway, Madras, upto 3 p.m. on Thursday the 9th June, 1955, for the supply of wooden sleepers for track and specials, as detailed below :—

(i) TRACK SLEEPERS

Broad Gauge	..	9'-0" x 10" x 5"	—	Any quantity
Metre Gauge	..	6'-0" x 8" x 4½"	—	do.
Narrow Gauge	..	5'-0" x 7" x 4½"	—	do.

(ii) SPECIALS

In various sizes .. Nos. 51289

2. (a) Track Sleepers.—Tenderers should state, clearly and specifically, the actual quantity they can offer under each individual species at the ceiling rates inclusive of S.T. as given below :

Rate per sleeper F.O.R. (West Coast Areas)

	High grade species viz. Teak, Nangal, Erul, Irumbogam & Rosewood		Other species viz. Karimadu Vengal & Vayal		Low grade species viz. Aini, Anjan, Naval, Poon and Pillamarudu	
	I class		I class		I class	
	Rs.	A. P.	Rs.	A. P.	Rs.	A. P.
Broad Gauge	20	0 0	19	8 0	17	0 0
Metre Gauge	9	8 0	8	14 0	8	0 0
Narrow Gauge	5	12 0	5	4 0	4	14 0

(b) Tenderers are also invited to tender, at an increased rate of Re. 1 for B.G., Re. 0-8-0 for M.G. and Re. 0-4-0 for N.G., over the ceiling rates given above, additional quantities clearly specifying the quantity under each individual species.

(c) Specials.—Acceptable under High Grade and other Species only.

3. Intending tenderers may tender to supply track sleepers alone or specials alone or both.

4. Tenders should be in the prescribed form obtainable from the Chief Engineer, Southern Railway, Madras, on production of a receipt for the amount of Rs. 10 (Rupees Ten only) towards the cost of a set of tender forms (one for track sleepers and one for special size sleepers) paid to the Chief Cashier, Southern Railway, Park Town, Madras-3. In no circumstances will the cost of tender forms be refunded.

5. Tender forms will be issued up to 12-00 hours on 6th June, 1955.

6. Earnest money of Rs. 1,000 for each tender is to be paid in advance to the Chief Cashier, Southern Railway, Madras, and the receipt submitted along with the tenders. The final date for the deposit of earnest money is 12-00 hours on 8th June, 1955. When remitting the earnest money deposit, the Chief Cashier, Southern Railway, Madras, must be advised that the amount is being deposited in connection with a tender for the supply of wooden track/special size sleepers. Currency Notes or Demand Drafts should not be enclosed with the tenders.

7. The Forest areas from which the sleepers are to be supplied are those lying in the States of Madras, Bombay, Andhra, Hyderabad, Mysore, Travancore-Cochin and Coorg. Offers for supply from areas other than those stated herein will not be considered.

8. The Chief Engineer does not bind himself to accept the lowest or any tender and reserves the right to accept sleepers offered either in part or in full.

9. Tenders will be opened by the Chief Engineer, Southern Railway, Madras, or his representative at 11-00 a.m. on Friday the 10th June, 1955.

10. Tenderers are required to submit Income-tax Clearance Certificate in original along with their tenders.

Miscellany

G. Runga Raju

'COSTING' OF RAILWAY TRAFFIC AND SERVICES

COSTING technique for application to competitive industry has made swift strides in the last two decades. Rail transport constitutes mainly the sale of service: manufacture of equipment required for offering this service, efficiently and economically—locomotives, coaches, wagons, etc.—may be considered as ancillary to it. The advances made in that technique have been applied to the latter; but the necessity for doing so, in regard to the service, in a thorough-going manner, has not arisen so far. The Transport Act 1953 in the United Kingdom, requiring the Railways to work under competitive conditions, has now imparted urgency for devising appropriate types of technique, for determining the costs of operation of this service, for fixing the price for its sale.

Mr. A. W. Tait, Director of Costings, British Transport Commission read a Paper on "Costings and Charges" before the Railway Students Association, London, on January 26, covering a wide range of passenger and goods movements, having in view how the competing road services in U. K. average their cost and prices.

The gist of his exceedingly interesting thesis is as follows :

In regard to capital structure and working costs of railways, constant and variable costs and joint costs between passenger and freight services, the allocation of which between them on a statistical basis is extremely difficult, are characteristic of railway enterprise. In regard to British Railways, the "process of selective selling", in addition to their normal business, is rendered necessary, where conveyance by road by themselves or by contract, is possible at substantially lower cost than by rail, resulting, thus, in big saving to the country's transport costs, viewed as a whole.

Under the proposed charges scheme, only the maximum charges will be fixed, leaving the railways the choice for charging anywhere lower than those charges by agreement with the user and for this purpose a yardstick is required for the Commercial Manager for use as a measure of relative costs of the "regular traffics and services, which make up the greater part of his sales." If so, the general aim of railway charging policy will, apparently, be to ensure that "direct costs of each transaction are covered and that the indirect costs as a whole are recouped from individual traffic in accordance with the possibilities in a competitive market."

Direct and indirect costs are grouped as follows :

Direct costs

- Motive power unit
 - Provision and maintenance
 - Stabling and servicing
- Trailing unit
 - Carriage or wagon
 - Provision and maintenance
 - Stabling and servicing

Unit of output and/or cost measurement

Engine hours and engine miles
Engines serviced

Wagon journey: car mile or car day
Wagon mile, carriage serviced

Direct costs

(c) Operation

Wages of train crew
Fuel and water etc.

(d) Ancillary movement

Shunting and marshalling
Carriage empty running

(e) Terminal

Provision and maintenance of
stations and Depots staff
dealing with passengers and
goods at terminals

Indirect costs

(a) Documentation

Staff, tickets, stationary used, etc.

(b) Loss and damage

Claim paid and cost of dealing with
protection inquiries and claims

(c) Commercial administration,

Commissions, etc.

For a charging policy, the direct costs for a wide variety of traffic are required: the general level and relativity of prices in relation to the levels of direct and indirect costs are also required. Considerable foresight and imagination will be necessary for making this costing system flexible to meet changing situations.

We have to watch these developments closely, to see how far the methods evolved and proved dependable could be applied to the charging systems of Indian Railways, with advantage.

Wagon User

Mr. A. P. Hunter, Chief Operating Superintendent, North-Eastern Region, writing in the current number of 'British Transport Review' states that the whole freight business of the railways depends upon wagons of the right type, being in the right place, in the right numbers, at the right time. Assuming a saving of half a day in the average round trip time, he estimates that over 59,000 fewer wagons will be required on the British Railways, for handling the same volume of traffic. The sample survey, on which he bases

Unit of output and/or cost measurement

Hours and miles
Pound per hour and mile

Wagon or carriage attached or detached

Passengers using stations
Package, consignment or ton of freight

Tickets issued
Consignment booked

Consignment according to class of goods and
transit

his estimate and its result, may not be comparable with Indian conditions, requiring long period of loaded haul and equally long period of empty haul, for instance, coal wagons from Mohuda to Trivandrum. According to Railway Board's Administration Report for 1953-54, Volume I, the total number of wagons, in units, is more than 220,000. New wagons, about 10,000 a year, are added to this stock, year after year and yet the demands are not fully met. The possibilities of intensive use of wagons are worth examining, having in view the improvement in average haul and the reduction in the period of turn round. During the year 1953-54, the average haul per day was 40.1 miles on broad gauge and 28.4 miles on the metre gauge, as against 41.1 and 31.4 miles respectively during the previous year, indicating a drop in both the gauges. The improvement in this is conditioned by various factors—availability of motive power, increase in track capacity, alterations in signalling and tele-communication arrangements, etc. and endeavours are, no doubt, being made to get over the shortcomings in these respects, with the time-lag involved in import of materials from abroad. The scope for

improving the turnround, even within the limitations, mentioned above, has to be explored, at any rate in large Depots and Terminal points, in particular. Demurrage on wagons to be released is a bagatelle, when compared with the loss of earning capacity of wagons or the social advantage, resulting from quicker movement of goods. If the railways undertake unloading of wagons, containing goods, subject to 'L' condition, as a normal practice, charging the higher terminal of 8 pies per maund, it is quite likely to result in saving of release time, improving thereby the turnround. The change may not be quite welcome at the outset, as traditions die hard; but later, the User will very soon appreciate, that it is really to his advantage, as the alternative to curtailment of free time, now allowed for release of wagons. Another instance of delay in turnround appears to occur in Railway Workshops and it will be interesting to have the results of a census for a period, in all the workshops of Zonal Railways. In respect of release of loaded wagons, the Mechanical and Stores Departments, in the workshops, are no better than the public users and arrangements made for improved turnround should apply to them also. A contributory factor for increasing the period of loaded haul is imperfect documentation, resulting in such wagons being held up en route as "unentered". More often than not, valuable time is spent in tracing the whereabouts of such wagons. The alternative appears to be to release them forthwith, immediately on arrival at stations and then pursue the correspondence as regards correct destination. Closer contact between Commercial and Operating departments is, nowhere, needed more than in the case of these "orphaned" wagons.

Surcharge on "small" consignments

Effective from April 1, 1955, a surcharge of 6½ per cent or one anna per rupee of total freight is leviable on Indian Railways, on goods traffic in

"small", tendered in quantities of less than 20 maunds per consignment. A comparison of freight, for instance, on cocoanuts from Rajahmundry to Madras, for a lot of 18 maunds and a wagon load for the minimum of 300 maunds is shown below:

		At Class 3		
		Rs.	a.	p.
For 18 maunds	...	20	15	0
Surcharge	...	1	5	0
Total	...	21	4	0
Per maund	...	1	8	9
		At Class 2 for minimum of 300 maunds in a broad gauge wagon		
		Rs.	a.	p.
Total	...	818	12	0
Per maund	...	1	1	0

This difference in freight between smalls and car loads has created a new business in U.S.A. and Freight Forwarders—groups or companies—collect smalls from several consignors, intended for a particular destination and tender them for despatch at car load freight and arrange delivery at destination. The difference in freight is shared by them with the consignors. This arrangement, profitable to consignors of smalls as well as freight forwarders, is advantageous to railways as well, as traffic in car loads is less expensive to carry than smalls.

The volume of this business has grown to such dimensions that special legislation was found necessary to govern the relations between the freight forwarders, users and the Interstate Commerce Commission and Part IV, comprising Sections 401 to 422 had to be added to the Interstate Commerce Act.

Even the margin of 6½ per cent in freight, resulting from the surcharge, is sufficient for enterprising businessmen in this country to develop freight forwarding, in co-operation with the Railways and any enhancement in it will have less objection, as it will benefit the User, the Forwarder and the Railways.

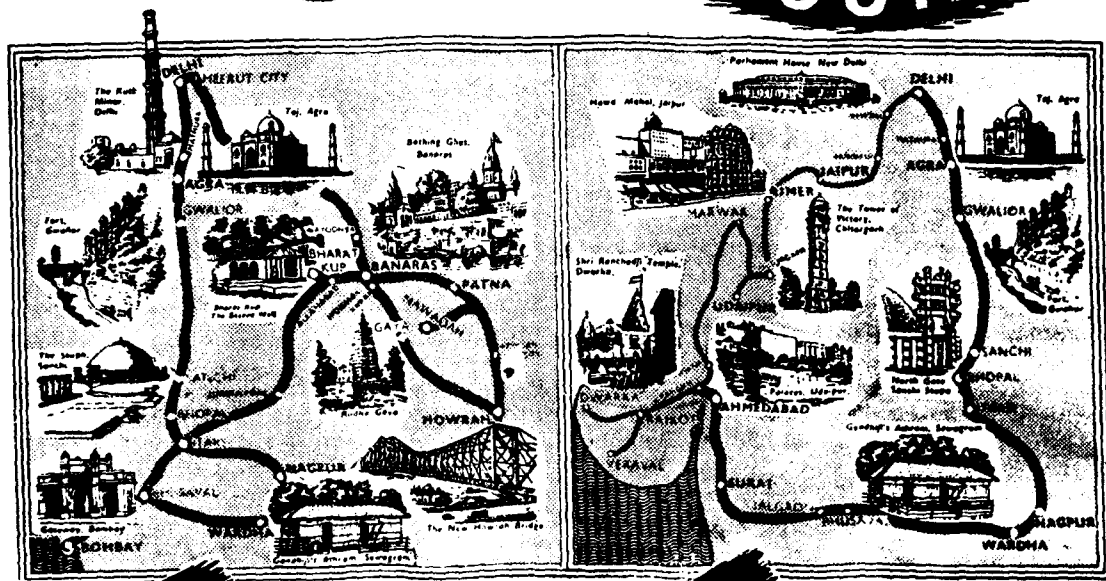
See India!

I, II or III Class

Concessional

CIRCULAR TOURS

TICKETS VALID FOR 3 MONTHS



TOUR No. 2
 Mileage: 3,825
 STATIONS COVERED:
 Bombay, Nasik Road, Wardha,
 Nagpur, Itarsi, Jabulpore, Allahabad,
 Gaya, Howrah, Patna, Banaras, Lucknow,
 Kanpur, Delhi, Mathura, Agra, Bhopal, Bombay.
 Adult I Class II Class III Class
 Fares— Rs. 242-2-6 Rs. 158-8-0 Rs. 90-12-6
 Children Half Rates

TOUR No. 7
 Mileage: 2,843
 STATIONS COVERED:
 Nagpur, Bhopal, Sanchi, Agra,
 Delhi, Bandikui, Jaipur, Ajmer,
 Chitorgarh, Udaipur, Marwar,
 Viramgam, Dwarka, Junagadh, Veraval,
 Rajkot, Ahmedabad, Surat, Jalgaon, Nagpur.
 Adult I Class II Class III Class
 Fares— Rs. 178-13-0 Rs. 117-4-6 Rs. 67-1-0
 Children Half Rates

Here are two typical Concessional Circular Tours — There are 8 such standard Concessional Circular Tours introduced by this Railway. Full details in regard to all the 8 Tours can be obtained from the Station Masters concerned.

You can also plan YOUR OWN CIRCULAR TOUR subject to certain conditions in force at concessional I, II or III Class Fares, particulars of which can be obtained from the Chief Commercial Superintendent, V.T. Bombay.

CENTRAL RAILWAY

Ticketless Travel and how to Eradicate it

K. Srinivasan

TICKETLESS travel is one of the most serious evils, which affects the Railways. This irregular practice may be attributed to four causes. In the first place, the poverty of the people. Secondly, the high cost of providing means of foolproof detection for preventing ticketless travel. The third cause is the psychological pleasure which is supposed to underlie the rampant evil of ticketless travel which is attributable to lack of civic sense and enlightenment. A large number of ticketless travellers are the so-called pious men—the holy mendicants scantily clad in torn clothes and smeared with ashes who have to be dragged by perspiring ticket collectors from carriages and pushed out of station gates. Unauthorised sellers of sweets, fruits and tea, mingled with beggars, entertainers and passengers create still further pandemonium. Carriages which are already full absorb dozens of ticketless travellers who get in after the train has started. Sellers of sweetmeat, vendors of tea, entertainers and passengers swell the number of ticketless travellers.

Overcrowding is one of the causes which contributes to ticketless travel. If carriages are abnormally overcrowded, it is not possible for ticket-checking staff to enter the carriages and check the tickets of the various

passengers—there being no room to do so.

The honest passengers who purchase tickets have to pay for the convenience of the ticketless travellers. This is as good as making the honest pay for the dishonest. This is not in the interest of the travelling public. Therefore some effective measures ought to be taken to eradicate the evil of ticketless travelling.

Although booking offices are generally kept open 2 hours before the departure time of trains, the majority of travelling public come to the station only about 20 minutes before the advertised departure time of trains. This results in congestion at booking windows. Huge queues have to be formed. The public have to be educated to use their discretion, come in good time to purchase tickets so as to avoid last-minute rush and being prevented from purchasing tickets before the departure time of train due to heavy rush at busy stations.

If there was no such thing as ticketless travel the position would have varied between the two extremes, either those people who now travel without tickets would not have travelled at all and would have relieved the general congestion, or they would have partly or wholly paid for their tickets in which case the surplus would have been greater.

TYPICAL CASES OF TICKETLESS TRAVEL AND HOW THEY SHOULD BE DEALT WITH

Serial No.	CASES	Demand to be made	Action to be taken if passenger fails to pay
I.—TRAVELLING WITHOUT TICKET			
1	Travelling without ticket but with guard's certificate 'A'	Single journey fare	113 or 112 according to circumstances
2	Travelling without tickets but with guard's certificate 'B'	Single journey fare <i>plus</i> lower penalty	113 or 112 according to circumstances
3	Travelling without a ticket and without a certificate or with a certificate which is not valid for journey to the point where he is detected	Single journey fare <i>plus</i> penalty.	113 or 112 according to circumstances
4	Children between 3 and 12 travelling without ticket	Single journey fare <i>plus</i> higher penalty	113 or 112 according to circumstances
5	Passenger detected travelling without a ticket and without a certificate and if he desires to go forward to his destination	Single journey fare <i>plus</i> fare from the place of detection to destination	113-A & 113
6	Passenger who fails or refuses to present for examination or deliver his pass or ticket immediately on requisition therefor	Ordinary fare for the distance <i>plus</i> higher penalty	113-A & 113
7	Passenger detected travelling without a ticket who refuses to pay charges due on demand and there is reason to believe he will abscond, his name and address are unknown, not given or there is reason to believe that the name and address given by him are incorrect	Ordinary fare <i>plus</i> higher penalty. Arrest under section 132 if applicable and prosecution	Prosecution under 112
8	Beggars and mendicants	Fare <i>plus</i> higher penalty. Until further orders if beggars and mendicants are unable to pay due charges they should be removed from the train at any station where detected	Prosecution under 112. (Arrest under 132 etc.)
II.—HOLDING TICKET BUT TRAVELLING IN HIGHER CLASS CARRIAGE			
9	Passenger travelling in a higher class of carriage than that for which he holds a ticket and obtained certificate form 'A'	Difference in fare between the two classes for the intended journey without any penalty	Section 113 or 112 whichever is applicable
10	Passenger travelling in a higher class of carriage than that for which he holds a ticket and obtained certificate form 'B'	Difference in fare between the two classes for the intended journey <i>plus</i> lower penalty	Section 113 or 112 whichever is applicable
11	Passenger travelling in a higher class of carriage than that for which he holds a ticket and without any certificate	Difference in fare between two classes for the intended journey <i>plus</i> higher penalty If the passenger wishes to continue in higher class he may do so paying for the class in which he intends to travel	Removal from higher class as per Section 113-A, also Sections 113 & 112

Serial No.	CASES	Demand to be made	Action to be taken if passenger fails to pay
III.—HOLDING TICKET BUT TRAVELLING BY OTHER THAN BOOKED ROUTE			
12	Passenger detected travelling by wrong route	If the route is shortest or quickest he may be allowed to travel without any charge, fare or penalty If he refuses to travel by the shortest or quickest route, he will be charged the fare for the route by which he travels without penalty	Section 113-A
13	Passenger travelling by other than route allowed by the ticket he holds with certificate form 'A'	Difference in fare if any between the booked and diverted route	113 or 112 as the case may be
14	Passenger holding return journey ticket travelling by other than booked route	Full fare for that route not covered by the ticket	113-A & 113
IV.—HOLDING TICKET BUT TRAVELLING BEYOND DESTINATION			
15	Passenger travelling beyond authorised destination un-intentionally	He will be allowed to return to the station to which he was originally booked on payment of the fare for the return journey by the next available passenger train and does not leave the station premises. Fresh E. F. T. should be prepared and the original ticket should be collected	
16	Passenger travelling beyond authorised destination intentionally	Difference between the fare paid and fare payable <i>plus</i> higher penalty	113-A & 112
17	Passenger travelling beyond authorised destination with certificate form 'A'	Difference between the fare paid and the fare payable	113 & 112
18	Passenger travelling beyond authorised destination with certificate form 'B'	Difference between the fare paid and fare payable, <i>plus</i> lower penalty	113 & 112
V.—TRAVELLING WITH EXPIRED DATE TICKET			
19	Passenger travelling with a ticket which will expire before he reaches his destination	Single journey fare from the station where his ticket expires to his destination <i>plus</i> higher penalty	113 & 112
20	Passenger travelling with a ticket which will expire before he reaches his destination with certificate 'A'	Single journey fare from the station where his ticket expires to his destination <i>plus</i> no penalty	113 & 112
21	Passenger travelling with a ticket which will expire before he reaches his destination with certificate form 'B'	Single journey fare from the station where his ticket expires to his destination <i>plus</i> lower penalty	

Serial No.	CASES	Demand to be made	Action to be taken if passenger fails to pay
VI.—TRAVELLING WITH IRREGULAR TICKETS			
22	Passenger travelling with a torn, mutilated ticket in which destination cannot be deciphered.	Fare due <i>plus</i> higher penalty	113-A, 113 or 112
23	Adult travelling with a half ticket	Difference between full and half fare <i>plus</i> higher penalty. Fare due <i>plus</i> higher penalty	113-A, 113 & 112
24	Travelling on a wrong portion of a return ticket..	Fare due <i>plus</i> higher penalty	113-A, 113 & 112
VII.—UNAUTHORISED BREAK OF JOURNEY			
25	Passenger travelling by a permitted alternative longer route breaks journey where such break is not permitted	Difference between the actual fare by the longer route and the fare paid without any penalty, ticket being confiscated.	113
26	Passenger insisting on break of journey not allowed by cheap concession ticket	Difference of fare paid by him and the fare payable for the journey performed. The ticket to be confiscated	
VIII.—FRAUDULENT USE OF TICKETS			
27	Passenger holding a ticket issued at concession rates to students or to Police or free tickets in such cases		Ticket to be confiscated, arrest under Section 112
28	Passenger holding another man's season ticket ..		Ticket to be confiscated, arrest under Section 112
29	Passenger using a single pass or ticket which has already been used on a previous journey		Ticket to be confiscated, arrest under Section 112
30	Passenger travelling with a ticket or a pass of any description with date of issue or period of availability, destination, or its number altered.		Ticket to be confiscated, arrest under Section 112
IX.—MISCELLANEOUS			
31	Person found to be travelling in guard's brake van or on engine without proper authority	First Class fare <i>plus</i> higher penalty	113-A, 113 & 112
32	Passenger found without ticket in Railway Mail Service compartment	Third class fare <i>plus</i> higher penalty	113-A, 113 & 112
33	Attendant in excess of the number allowed free ..	Third class fare <i>plus</i> higher penalty	113-A, 113 & 112

Serial No.	CASES	Demand to be made	Action to be taken if passenger fails to pay
X.—MILITARY TRAFFIC			
34	Military personnel travelling on unexchanged Military Warrants	Free E. F. T. should be issued and the original warrant should be collected and a special report should be made to officers concerned	113-A, 113 & 112
35	Military personnel travelling with Military concession other than warrants unexchanged but with guard's certificate	Concession fare due without any penalty. Concession form should be collected and sent with E.F.T. foil to the Audit.	Take down the name and address of the party and report the case to the officer concerned for recovery of the due charges and telegraph destination station to take similar action.
36	Military personnel travelling with Military concession other than warrants unexchanged but without guard's certificate	Concession fare due <i>plus</i> higher penalty collecting concession form and sending it to Audit.	Do.



CONCESSIONAL TICKETS

A Holiday in the Hills is ideal for those who are planning an escape from the heat and dust of the plains during summer. The Hill Stations of India from Kashmir to Ootacamund and from Abu Road to Shillong offer a rich variety of scenic beauty, bracing climate, and amenities to suit the tastes and means of each visitor.

The Indian Railways are issuing from 1st April 1955 concessional tickets to Hill Stations as detailed under:—

FARES—Return tickets at one and a half single journey fares.

CLASSES—First, Second, Third and Servant tickets.

AVAILABILITY—For three months from the date ticket is available for commencement of the journey.

FROM—Any station in India **TO**—Simla, Solan, Dharampur Punjab, Dehra Dun, Pathankot, Kathgodam, Ootacamund, Kodaikanal Road, Abu Road, Coonoor, Darjeeling, Kurseong, Shillong. Piparia and Kotagiri Out-Agency (served by Mettupalaiyam at 1½ single journey fares for the rail portion plus 2 single journey fares for the road portion).

Please note that

The concessional tickets are issued from all stations from which the chargeable distance is 150 miles or more.

These Concessional Tickets will be issued up to October 31, 1955.

For full particulars please contact the nearest Station Master.

NORTHERN RAILWAY

May 1955

TICKETLESS TRAVEL

39

In order to check the rampant evil of ticketless travel, the following measures are suggested for adoption

1. A system of checking at selected important stations by Ticket Checking Squads under the guidance of an officer at short notice may be tried. Checking on trains by TTIs or TTEs in batches should be tried often. Officers also should exercise surprise checks of trains and record results while on line.

2. The raid system of removing squads from their section and converging on a central point occasionally with special checking parties may be tried with beneficial results at Junction stations. Ticket checking staff should be instructed to pay special attention to stations where the percentage of missing tickets is high. There must be a rotation of checking squads periodically.

For surprise checks and raids, squads of men numbering from 10 to 15 may be drawn up and moved down to a given point where they can have surprise checks. All gates and entrances should be manned and trains checked at the halts. For raids, the staff are moved in and out in squad formation between given points, raiders of trains converging on the place of check.

'Block System' of checking by which the normal checking staff at important stations should be reinforced by extra ticket checking staff may be tried to make the station-checking tight. We must have a leave reserve who should also be utilised during times of fairs and festivals for intensive checking.

8. Fencing should be provided at stations which are festival centres. Even the off-side of such stations should be properly fenced because the pilgrims who intend going to the temple detrain on the off-side and proceed to the temple which is on that side.

4. Trial of ticketless passengers should be done promptly and on a large scale. Camp Courts should be arranged and Stipendiary Magistrates may be appointed to try railway cases empowered to deal with ticketless travellers. Each magistrate accompanied by police and a batch of TTIs may carry out

checks within the jurisdiction allotted to them. Check may be carried out on running trains also. A mobile gang may be transported by road to certain pre-selected points which may be a station or its outer signal. In case a station is selected, the Magistrate's Court may be held in an upper class compartment of the train service or in reserved bogie third. If the selected point is an outer signal, the Court may be held in the Station.

5. Periodical surprise checks by mobile ticket checking staff with the assistance of Railway police have to be done regularly. The movements of the members of the mobile checking staff on a target venue of operation should be kept confidential. When the train is brought to a halt the police should immediately cordon it off so that ticketless travellers do not escape detection while the TTIs and TTEs proceed to do a thorough check, while the passengers without tickets or with improper tickets or unbooked luggage in their possession have to be excessed as per rules. Those refusing to pay railway dues on demand and also those guilty of intention to defraud the Railway are to be placed before the magistrate for prosecution. Police may be attached to each squad. Normally, 4 policemen and 4 Scalesmen or Weighment Hamals may work for each squad.

6. Lady TTIs may also be appointed to deal with lady passengers in travelling compartments exclusively reserved for ladies on the main line.

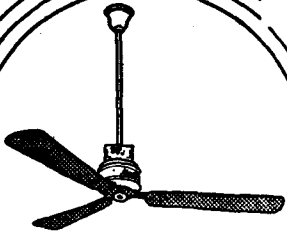
7. Beggars, hawkers and vendors' nuisance may be dealt with by the TTIs.

8. Under-weighment of consignments forms a major source of leakage of Railway Revenue. It should receive special attention. A reweighment squad (4 to 5 TTIs) may be formed with scalesmen to assist them and do reweighment of passengers' luggage on line and also at stations.

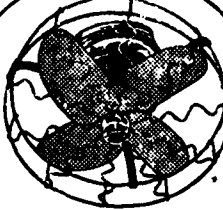
9. A proper supply of tickets to stations must be ensured.



Kassels

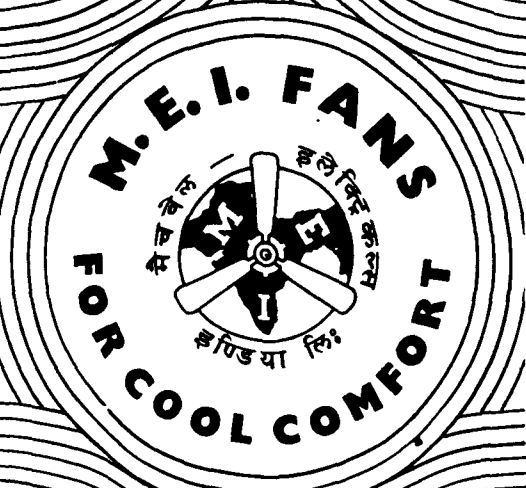


Kassels A. C.
capacitor type

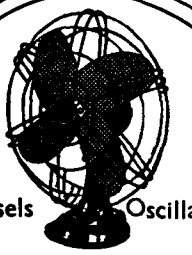


Kassels Tilting
Cabin Fan

CEILING,
TABLE,
CABIN
AND
RAILWAY
FANS

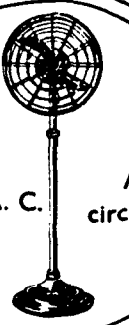


AIR
CIRCULATOR,
PEDESTAL
AND
CINEMA TYPE
FANS



Kassels Oscillating
& Fixed Table Fan

**MATCHWEL
ELECTRICALS
(INDIA) LTD.**
Managing Agents:
Kassels Ltd.
P. O. Box 1430
DELHI



Kassels A. C. Air
circulator

Delhi Phone No. 24111

Sole Selling Agents for South India:

Messrs. Gordon Woodroffe & Co. (Madras) Ltd.

P. O. Box No. 42, Madras 1

Phone: 2978 (3 lines)



Typhoid Fever

Dr. L. R. Parthasarathy, M.B., B.S., D.M.R.
Assistant Surgeon, S. Rly., Perambur

TYPHOID is an infectious disease recovery from which is as slow as it is uncertain, unless extraordinary care is taken in treatment and nursing.

The disease is prevalent in Madras State, mostly from the months of September to February. The incidence is gradually raised from September, reaching its peak in November-December. Thereafter it declines towards February.

The major part played in the spread of typhoid is by the house-fly which is found everywhere mingling with man, perhaps ever since the dawn of mankind!

The specific micro-organisms which cause typhoid are called B Typhosus and Paratyphoid Bacilli A and B. The flies do the job of carrying these germs by landing on human excreta and depositing them on exposed foodstuffs. Man gets infected by taking contaminated food and polluted water. The infection is also caused by getting into close touch with typhoid patients without observing the precautionary instructions.

Early Symptoms and Diagnosis

The attack of typhoid commences almost stealthily in the chills, headache and pain all over the body. Then there is a gradual rise of temperature day by day in a ladder-step fashion for

about six days. The mouth becomes dry. Often the bowels are loose. But there may be constipation in some cases.

Early diagnosis is of great importance. For it will enable full precautions being taken against the spread of infection. The disease is confirmed only after careful clinical and laboratory tests of blood etc., by qualified medical men.

Treatment

When once the sickness is diagnosed as typhoid, treatment is instituted. Simultaneously preventive steps against spread of infection are undertaken. As patients may be infective even from the early stages of the attack, it is most advisable to admit the patient in a hospital rather than giving home treatment. In treatment, nursing is of the first importance. Absolute bed-rest is essential.

As regards diet, I do not believe in starving the patients. They may be allowed daily arrow-root kanji—two pints, sago kanji—two pints and well-skimmed butter milk—two pints. In addition, they may be given orange juice, six to eight ounces a day. Glucose can be added but not liberally. If the motion shows curdy precipitate, it means milk is not digested well, in which case it would be advisable to use citrated milk. The diet is

maintained till the fever comes down to normal. For the first three days of the afebrile period (no fever period), no alteration in diet is necessary. Then the diet is slowly increased by including soft portions of bread boiled in milk, custard and mashed potatoes. This is for three days more and from the sixth day of convalescence, double-boiled rice and curds are given.

The schedule of diet as advised by the medical attendant should be strictly adhered to. As for drug treatment, it has undergone a radical change with the introduction of antibiotics. Chloramphenicol (Chloromycetin) has an established place in the treatment of typhoid and it is recognised as a potent remedy for this malady which was at one time a serious disease with a prolonged duration. It is gratifying to note that with the invention of the wonder drug, the disease has almost been controlled and mortality rate has been reduced from 45 per cent to 4 per cent. The actual dosage and nature of administration of this drug depends on individual case as decided by the doctor treating the patient.

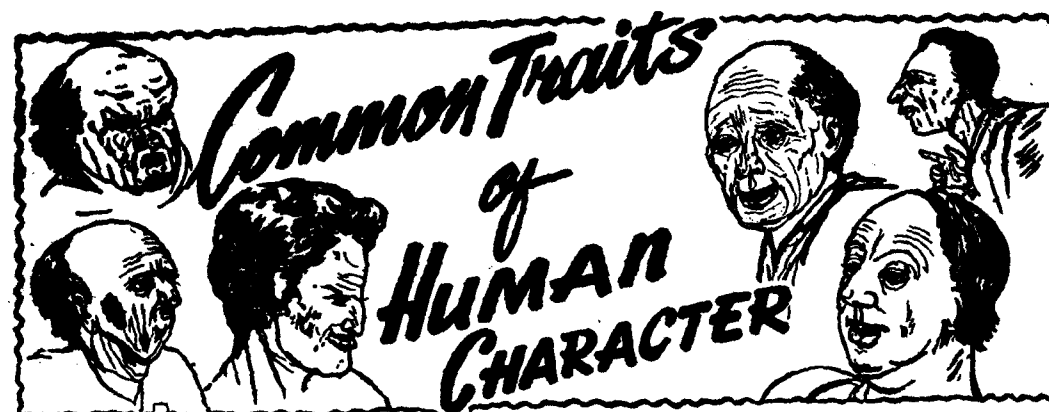
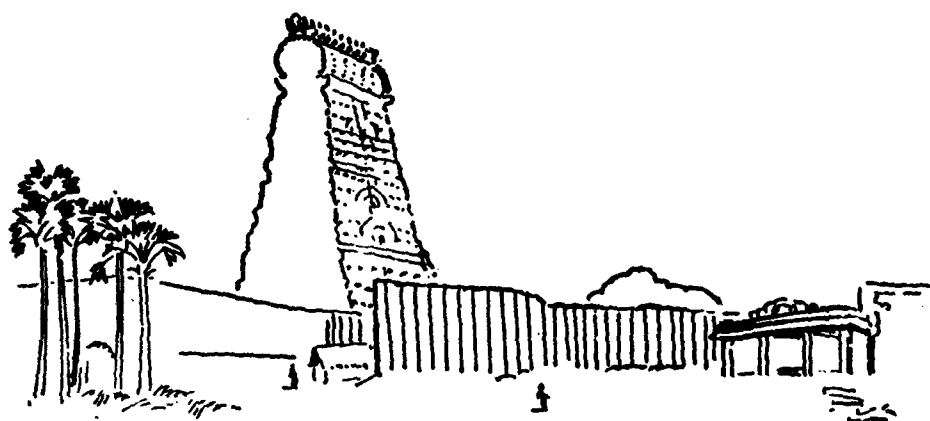
Convalescence

Convalescence is generally slow and careful vigilance must be kept for relapses, which happen in nearly 10 per cent of the cases and commonly a week after normalcy is restored in temperature.

Prevention

As a protective inoculation a vaccine named T.A.B. is in use. This gives protection for at least one year. Drinking water must be boiled. All foodstuffs must be protected from flies and dust. After handling a patient, hands must be thoroughly washed. The excreta of the patient must be burnt. The clothes are to be disinfected. In short, hygienic upkeep of the utensils and the surroundings, protection of foods against fly-contamination, scrupulous care to the personal hygiene and inoculation of the members of the household—all go a long way in preventing infection of the disease.

The easy availability of a sure cure for the infectious typhoid should not allow us to relax our efforts towards personal and social hygiene. Here again let me remind "Prevention is better than cure".



(3) Irony

S. R. Srinivasa Raghavan
Integral Coach Factory

TO define irony briefly, it is a misrepresentation of facts in word and deed. It is a misrepresentation not made with the intention of giving a better view of facts but only worse.

Irony is in the blood of an individual who thinks he has had a large experience of life and hence exhibits a cynical attitude always in his words. Irony, when classified as a sort of humour, only represents the existence of wit in a perverted form. But, generally, persons with the salt of humour in them are not usually ironical.

I know an individual who is constantly critical of our political bosses and, whenever he is in the company of newspaper readers, remarks, "Ramaswami, Minister for such and such is opening an institution today, isn't it? This is the news in the papers today, I hope." He intends evidently to be ironical.

The ironical man, when he has enemies, approaches them and expresses a desire to have a talk with them so that mutual hatred may cease forever. When an ironical man approaches you and praises you, you should not fail to take the praise with a pinch of salt; because it is sure that

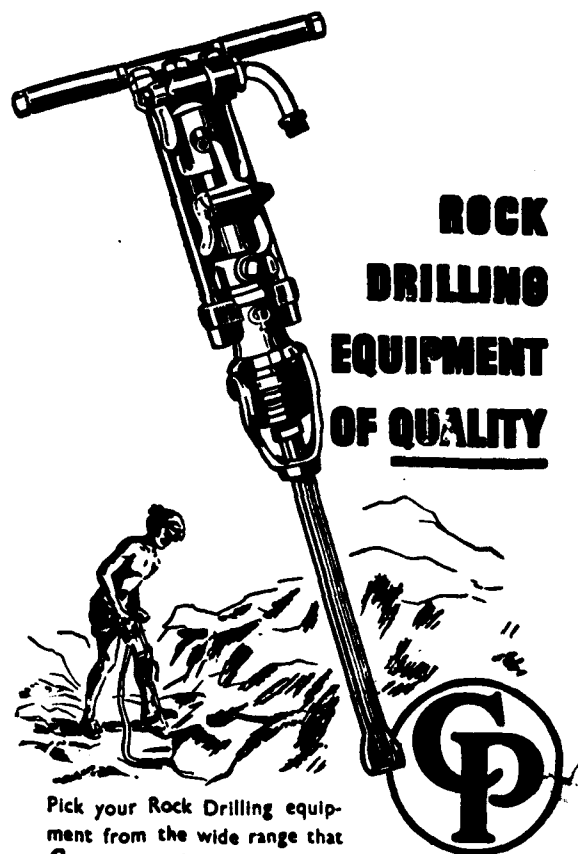
he is going to inveigh against you immediately you leave him alone.

I remember an incident that happened ten years ago in our village. Two neighbours had a dispute over the borders of their respective lands which were adjacent. As is usual they carried the dispute to a law-court where it developed into a conflagration. The disputants became enemies all right. From a lower court the case went stage by stage to a higher court and it was almost on the precincts of the Privy Council. At last it was decided against one of them as was sure to happen. He was one Ramanna who was sitting crest-fallen in his pial one day in conversation with a notorious individual in the village by name Rangan, when I approached him. I was surprised how on earth Ramanna chose this individual to convey his misery to. I sat beside them silently hearing the conversation. It was highly interesting to hear Ramanna delving in detail into the intricacies of law; he had practically become a "court-bird" with his one experience in life. From the lowest peon in the court to the apostles of justice he characterised one and all of them like a perfect artist. During the whole conversation, Rangan was all sympathy and pretended to take a great interest in

Ramanna's well-being. The conversation was interrupted by Ramanna's wife who called him inside for some reason. Rangan took this opportunity of expressing his opinion to me very crisply: "Fool of a darned ass! Paiyakkutti gave this fellow a sound beating; this fool will never go to court again. I think he has learnt a lesson." Ramanna rushed out again to finish the narration and Rangan began to inquire quite interestedly. "What happened then?" I left them to their freedom and went home, absorbed in a picture of Rangan's character that had drawn itself in my mind. That is an ironical man.

Recently I came across a queer individual while travelling by the suburban electric train. A beggar got in one of the wayside stations, and with a loud clatter of two small wooden instruments began to sing and beg. When he neared the man seated opposite to me, the latter produced a five-rupee note out of his pocket and offered it to the beggar with a nod of his head. The beggar stood aghast; definitely a five-rupee note was not the thing he could have normally seen. The individual opposite to me pressed the fellow hard to take it which he did and ran away at the next station. The man opposite told me in a murmur that he was not quite rich. This is another sort of irony.

Theophrastos says that ironical men are so double and designing in character that they are more to be guarded against than serpents. Personally I hold them to be fine specimens of life worth study; after all the world is full of variegated character-pieces for a psychologist to enjoy.



Pick your Rock Drilling equipment from the wide range that **CP** offers—sinker and diamond drills, Feedleg equipment, Tungsten Carbide tipped Swedish steels, Drifters and Rotary Drilling equipment. **CP** Rock Drills are powerful, easy to handle, fully cushioned with superior valve design. Whatever the job, **CP** have the right drilling equipment for it. For further particulars send for Catalogues.

Backed by generous and efficient service.

FOR THE RIGHT APPROACH ... THE RIGHT EQUIPMENT

CALL IN **Consolidated**

Consolidated Pneumatic

TOOL COMPANY LIMITED

Post Box 285, BOMBAY, 1.

Phone: 31747

Branches:

CALCUTTA - Grosvenor House,
21, Old Court House St.,
P. O. Box No. 805.

MADRAS - Finance House,
Pacullos Road,
Post Bag No. 5251.

KARACHI - Post Box 4763.
LAHORE - Post Box 1854.

Delhi Representative:

Mr. P. S. PRUTHI, 14/8, Block No. 4, Uttari Marg
NEW DELHI

Perur—or 'Mel' Chidambaram

P. S. Subramaniam



The Perur Temple near Coimbatore

PERUR—or Mel Chidambaram of it is called—is a shrine of great sanctity to the Hindus of Coimbatore and the West Coast. It is situated amidst picturesque surroundings about 4 miles off Coimbatore town on the banks of the Noyal river. The village itself nestles in the midst of green paddy fields and palms. The temple is one of the seven famous Kongu Sivalayams of the South and is therefore of great antiquity. It is known to be one of the most famous temples which were respected by the Muslim ruler Tippoo. Each year, in the month of Margazhi (December/January) thousands of pilgrims foregather at Perur for the **Arudra Darsanam**. In fact those who cannot afford a visit to far-off Chidambaram for this holy day are quite content and happy to visit Perur and worship at the shrine.

A Clean and Imposing Temple

The temple itself is a fine structure, with an imposing **gopuram** and a **dhvajastambha** which is a monolith. It is believed that portions of the main temple were built by Alagadri Naicker, a near relation of the famous Tirumalai Naicker of Madura. The sculpture is rich and interesting and typical of Siva temples of the adjoining Tamil districts. The entire precincts of the temple are so clean and neat that, in this respect, it can be compared with some of the famous temples of Malabar.

As with other temples of fame and antiquity, Perur also is full of lore. There is the story of an incident connected with the famous Tamil saint and devotee, Sundaramurthi Nayanar. It is said that, on one occasion, when the saint was approaching the temple for

(Continued on page 56)

What is Production

P. R. Muthukrishnan

Production Dept. Perambur Works

PRODUCTION Organization functions without any interruption from its inception much to the satisfaction of the Administration and dissatisfaction of the Workshop. The production department started to be a novelty and has developed today into a living entity divorced from fiction. It can be easily asserted without fear of contradiction that the utility of the Railway Workshops can be magnified manifold, should the Production Department receive the necessary nursing and its scope extended wide in the days that follow. But without much more ado, it is better to reveal the "Modus operandi" of this department to the people outside its fold and remove all prejudices.

The Production and the Progress Departments are the two subsidiary units under the Production Organization. The Production Department to all intents and purposes is the Eucharist of "Production" while the Progress is the executive branch of the same. The Production with Planners lays out the best method of manufacturing a job (with respect to quality and cost) that goes through the shop with the time estimation on it. The "Progress" places the order on the shops as per instructions from the Planning department. Though the estimated time is consistent with all canons of reason, the state makes an allowance of 66.2/3 per cent on it, as an incentive to workmen, for the relaxation of the human element and other incidental wastages which the workmen create to enable bonus being earned.

A good turnout of work is rewarded with bonus to the extent of 50 per cent of time saved on the job rate (166.2/3 per cent of the estimated time). Being well provided for all such exigencies, there is no reason why the

workmen should not earn bonus and at the same time complete the job soon. An average workman has the scope to earn bonus to the extent of 33.1/3 per cent on the estimated time. Certainly an efficient worker earns more. For all the purposes of consideration the job can be supposed to be done in about one and two-thirds the time estimated by the planner. It is absolutely impossible that the workmen should transcend this limit unless it be that he disregarded planning layout or failed to manipulate the machine well. Of course, the principles of production are as harsh as truth and uncompromising as justice. It does not make allowance for a man to while away the time unnecessarily or slacken much less to go asleep when the job is half way through the machine.

It shall be our next endeavour to go a step further and study some of the crucial points of the production. The Planner never lays out the time estimation in strict conformity with the efficiency of the machine. The utility of the machine is high but the quantity of production is low. The difference between these two factors—utility and production—solely rests upon the workmen. Prior to the introduction of the Production department, this difference was vast in quantity and varied with the type of men employed. The wastage that was unlimited and neglected before is questioned and obviated now. What was an option before is an obligation now, to the workmen. Herein lies the main solution for the ills of the era of inertia. The amount of wastage of material on the iron and wood sides was appalling and unthinkable. The Production department is more considerate and hesitates to dismiss them with such scant courtesy, until they become one with the dust. It has come to find use for every list of material unlike

May 1965

WHAT IS PRODUCTION

47

before, by preserving them for suitable occasions.

Unserviceable materials are collected in a centralised place (Scrap Reclamation Stores) and are given a new finish where possible for utilising for next lower or higher size or using as raw material; for instance if a 'XD' piston rod is condemned due to undersize the same is utilised for a W class engine. If an axle is condemned being undersize the same is reclaimed for use as bar material or for forging purpose. Apart from this a lot of general items such as bolts, nuts, washers, studs, etc. collected in shop yards are reclaimed. This novel method not only expedites work but also checks the expenditure. In point of fact, when the utility of such material is increased, the cost of repairs runs low. If with all these accomplishments, the Production Department is not a valuable asset to the Railways, what else is?

But this is not all. More are the fruits of "Production" than are apparent, if the honesty of the workmen comes to prevail. It is impossible for the Bonus Supervisor to keep a vigilant watch over every job and control its timing as far as labour is concerned. It is the responsibility of the shops to co-operate with the progress in seeing that the workman earns a good wage for a good day's work. This body, especially the Chargeman and the shop supervisors, should use their discretion in allowing the workmen time for setting up the machine only if occasion demands it, for this consumes quite a good portion of the machine time. Together, this same staff must deny undue advantages to the workmen when they abuse the value of time and show a dishonest record of work for therein lie the fundamental of bonus calculation. If the Chargemen and Supervisors fail to do this, the production will step into their shoes and take it up. Much is said about the control of the supervising staff on the shop floor and more is left for them to imagine.

Similarly with a view to control on the store side an organization exists which is called "Budget Control Section". This section scrutinizes every indent submitted by "Progress" to ensure that no excess material is drawn than actually necessary and that no suitable old material is available for re-use. This organization is a liaison between Production and Progress for effective checking in the leakage of stores.

The activities of the "Production" are incomplete unless load date is maintained to avoid any bottle-neck in any particular operation and also to avoid taking any work that could not be done within the target date. And also proper records are maintained about the efficiency of each operator and the machine to assess the general outturn of each shop. If the Production department has developed on proper lines, the efficiency of the Railway Workshops will increase and this will reduce the cost of maintenance, as it is the brain of nerve centre of the workshop organisation.

Those who mailed at the Production Department before shall become converts now.



SOUTHERN RAILWAY

TENDER NOTICE

Tenders for the purchase of used empty gunnies and tins ex-Railway Stock Depots at Trichinopoly Junction and Rayapuram

1. Sealed tenders are invited for the purchase of used empty gunnies and tins which will be made available at the Railway Stock Depots at Trichinopoly Junction and Rayapuram, during the period of three months from 1-6-55 to 31-8-55 or till the closure of the Grainshop Organisation whichever is earlier.

2. Separate tenders on the prescribed forms must be submitted for the purchase of used empty gunnies and tins from each Railway Stock Depot. The price of each tender form is Re. 1 (Rupee one only) and is payable to the Chief Cashiers, Southern Railway, Trichinopoly Junction or Park Town, Madras. The earnest money required in each case as specified in the tender conditions should be remitted to the Chief Cashier, Southern Railway, Trichinopoly Junction or Park Town, Madras before 12-00 hours on 17-5-55.

3. Intending tenderers should obtain the tender form together with the terms and conditions from the undersigned in respect of Railway Stock Depot, Rayapuram, and Railway Stock Depot, Trichinopoly, on production of the Official receipt granted by the Chief Cashier towards the cost of the form. The tender form is not transferable and its price is not refundable.

4. Production of Income-tax Clearance Certificate in the prescribed pro forma IN ORIGINAL is an essential condition for consideration of the tender. Pro forma of Income-tax Clearance Certificate can be obtained free of cost from the office of the undersigned.

5. Tenderers who have no taxable income and who are therefore unable to produce a Tax Clearance Certificate in the prescribed pro forma must submit a duly sworn affidavit to this effect countersigned by the Income-tax Officer concerned as to its correctness.

6. The last date for the receipt of the completed tenders is 15-00 hours on 17-5-55.

Office of the Controller
of Grainshops
Madras Beach
26-4-55

CONTROLLER OF
GRAINSHOPS

SOUTHERN RAILWAY

TENDER NOTICE

Quilon-Ernakulam Railway Construction—
Section II—Kottayam (exclusive) to
Mavelikara (exclusive)—Earthwork in For-
mation, Service Roads etc., for the 3rd
Reach between Bridge No. 271 at chainage
259031 and Bridge No. 304 at chainage
289242 (Chainage from Ernakulam South
Station)

The Chief Engineer, Southern Railway,
Park Town, Madras-3, invites sealed tenders
upto 13-00 hours on 30-5-55 for the above
work.

Tenders should be in the prescribed form obtainable from the Chief Engineer's Office or from the Executive Engineer's Office, Quilon-Ernakulam Railway Construction, Ernakulam South or from the Assistant Engineer's Office, Quilon-Ernakulam Railway Construction, Quilon, upto 12-00 hours on 26-5-55 on production of a receipt from the Chief Cashier, Southern Railway, Park Town, Madras-3, or from the Station Masters, Ernakulam South or Quilon for payment made towards the cost of tender forms at the rate of Rs. 10 per set of tender forms and Rs. 2 per spare schedule, only if available, which amounts will not be refunded. Tender forms are not transferable.

An earnest money of Rs. 33,300 is to be paid to the Chief Cashier, Southern Railway, Park Town, Madras-3, before 12-00 hours on 27-5-55. The security deposit for the accepted tender will be 10 per cent of the value of the contract.

Particulars of remittance of money should always be clearly furnished to avoid unnecessary correspondence and delay.

Income-tax Clearance Certificate, in original, should be attached to the tender; if previously sent and is current, reference to the particular tender with which it was sent should be furnished.

Tenders will be opened at 11-00 hours on 31-5-55.

The Chief Engineer does not bind himself to accept the lowest or any tender.



Eyes

V. S. Shanthalakshmi

ALTHOUGH most beauty problems can be conquered after a little thought and with the addition of the innumerable beauty preparations available today, eyes often present difficulties. It is recognised that the eyes are the most important feature of the face and should be a definite asset. Eyes cannot be tampered with, but the lashes and brows can be treated to give added beauty to the eyes.

Are your eyes too close together? If so, they will seem wider apart if the distance between the eyebrows is lengthened and rouge is applied on the cheek bones and not near the nose. The really perfect eyebrow should be neat and fairly narrow, tapering at the sides. The hairs should be dark and silky and all untidy hairs should be removed. Eyebrows give character to the face, and the natural shape should not be altered to any great degree. After applying make-up, the brow should be brushed with a tiny eyebrow-brush smeared with vaseline. Brush upward, downward, then in the correct way. This keeps the eyebrows silky and narrow.

When tidying the eyebrows, tweezers will do the trick.

Vaseline or some other form of grease should be applied to the brows and lashes nightly to increase their growth and darken them. Liquid darkener is preferable to an eyebrow pencil, and this can also be used for the lashes. Eye-shadow is growing in popularity since it can now be obtained in different shades. It adds depth and beauty to the eyes and covers any discolouration on the lids. Select your shade carefully. It should be used in the evening. A powered eye-shadow is patted on, in the usual manner with a puff, but the creamy type looks better if a little cold cream is smeared on the eyelid first.

Attending to the mere make-up of the eyes is not enough to keep the eyes bright and attractive. Of course a sparkling pair of eyes will look all the more lovely if made up nicely. But what about a pair of dreary, drooping eyes? The whole of the lot of the science of make-up can't do much to help those eyes. And we have only one pair of eyes to last us all our lives, and as we cannot buy a new pair if the present ones fail us, we may as well pay a little attention to the proper way of preserving them.

Some people, especially children are in the habit of using only one eye for

reading and close work. Some girls thrust their nose down into their needle-work. These are all mal-practices and they happen when one eye is good and the other eye is weak-sighted. This defect should be treated immediately, or else the sight may fade away altogether and leave you a Cyclopes. Some people indulge in the habit of rubbing the eyes, half opening them when looking into the distance and blinking. These habits may be due to strain, which makes the eyes more sore and smarting and the natural reaction is to rub them or blink them to ease the sting. The habit of half closing may be due to shortsightedness but it can be an affection too!

You should never tire them by reading in poorly-lighted trains and buses, or by working too long in artificial light. If you have been using your eyes hard all day, give them a rest when you get home. Wear spectacles if you find your work is straining your eyes. By wearing spectacles in good time you can only have to wear them for work. Carrots especially when eaten raw, are said to have good effect on your nightside and they are excellent for your complexion too!

Finally give your eyes as much rest as you can. Sleep with your head turned away from the window so that the light doesn't shine directly on to your face, and bathe your eyes night and morning with a weak boracic solution.

Eyes tend to get smaller as people grow older. This is partly because they are not exercised properly. Few people keep their eyes open enough. The muscles of the eyes are stretched a little when you do this, so that it would not be comfortable to keep the eyes very wide open all the time. Practise opening your eyes to their

fullest extent. Look upwards, downwards and eitherwards; open and shut the eyes several times. Roll your eyes round and round. A few minutes of eye-exercising and a short rest afterwards keep the eyes strong and healthy; these exercises are also good for the lids and the skin round the eyes.

SPECIAL RATES

(Continued from page 66)

economic conditions and equalize prices throughout wide areas". Yet as pointed out by me in North Malabar Chamber of Commerce v. Southern and Eastern Railways (1952 R.R.T. 15 at page 28), "the general rule is that carriers have no right to disregard distance and natural advantages in order to bring about a commercial equality". * Each locality competing with others in a common market is entitled to reasonable and just rates at the hands of carriers serving it and to the benefit of all its natural advantages. The small difference in the Bisco-Bombay and Bhadravati-Bombay rates is intended to achieve this object by giving an advantage to the latter in recognition of the lesser distance. So what is required is that the rates for the larger distance for competitive or similar movements should continue to be more than that for the shorter haul but the rates for the longer distance need not necessarily be in proportion to the distance and can be cut down to the extent necessary to enable the producers to market the produce at distant markets with a reasonable margin of profit to the trader and with a reasonable profit to the railway. Judicious quotation of such rates will stimulate movements and get to the railways additional revenue.

(* underlining mine).

(To be continued)



THE BANANA

IN India we have fruits like mangoes, lichees, guavas, custard apples, oranges, pears, pineapples, bananas and scores of other kinds. When we eat some of these fruits, we may wonder how and where they are grown; how they came to our local market and in the basket of the fruit-wallah who brings them to our homes. So let us try and find out all we can about the banana as an example.

The banana is a common fruit we can buy perhaps all the year round. But there are certain countries in the world where bananas cannot grow because of the cold, so they have to be brought thousands of miles by cart, train and ship from some tropical country to a cold country like England.

The banana plant grows best in the warm, moist parts of South-East Asia, and in other parts of the world where the climate is similar. When trade flowed across the Indian Ocean Arab traders carried the dried roots of the banana plant from places in South-East Asia in their boats to East Africa, and from there across the continent to Guinea.

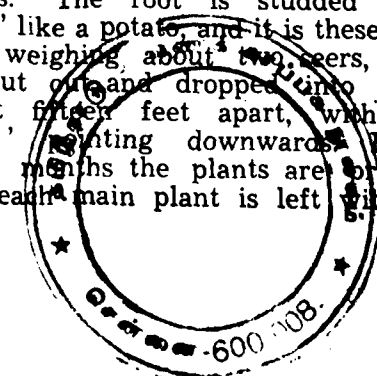
The Portuguese found the banana plant in 1482, and because the fruit was so delicious to eat, named it 'banana.' The banana was then

planted in the Canary Islands from where the first bananas were sent over to European countries. A Spanish holy man, named Tomas de Berlanga, took some banana roots to San Domingo, and because of this the banana was planted throughout the Caribbean regions, and later on the mainland of Central and South America. Today, the countries which grow and send out huge quantities of this fruit to other parts of the world are Jamaica, the Camerons, Honduras, Colombia, Costa Rica, Canary Islands, Guatemala, Mexico, Panama, Ecuador, Brazil and Nicaragua. If you want to know where to find all these places, get hold of your atlas.

Where do bananas grow best in these tropical countries? If you happen to live near a banana plantation you will probably find it is not very far from the banks of a river or canal. Bananas cannot thrive in a cold climate where the temperature drops below sixty degrees; nor do they grow well in hot dry places with little rain.

The banana plant does not grow from a seed, but from dried root stocks. The root is studded with 'eyes' like a potato, and it is these bits, each weighing about two pounds, that are cut out and dropped into holes about fifteen feet apart, with the 'eyes' pointing downwards. Every three months the plants are pruned, and each main plant is left with no

43451



more than two suckers. During this time all extra leaves are scraped away, exposing the surface roots, which causes them to go deeper into the earth.

Each banana plant usually bears only a single bunch, but these are not allowed to ripen on the plant. On large banana plantations a team of three men go into the field, the cutter with a sharp cutting instrument known as a machete, to cut the plant below the bunches; the backer to carry away the fruit, and the muleman to load up into the waiting transport. The bunches must never be bumped or bruised. The bunches are then stacked between thick layers of padding in carts or rail trucks and taken to the nearest river or sea port.

The ship that will carry these bunches of bananas over the ocean must be ready and waiting, and as many as 150,000 bunches, each containing 100 or more bananas, are loaded into the ship within 18 hours after they have been cut off the plants. 'Banana' ships are specially made for this purpose, and each has machinery for keeping the bananas cool, but they must never be frozen. Freezing bananas destroys their flavour and food value. The cooling plant blows cold air gently over the bananas so that the temperature remains the same throughout the voyage at about fifty-three degrees. Banana ships are painted white, because in the tropics the inside of a ship that is painted white remains about fifteen degrees cooler than one that is painted black.

When the banana ship reaches the home port, the work of unloading starts at once. A train is all ready and drawn up alongside at the pier, and the fruit is unloaded from the ship by an elevator belt fitted with canvas pockets. The rail trucks which take from 200 to 300 bunches of bananas are

also specially built for carrying bananas, and are fitted with ventilators for summer loading and steam-heated for winter loading. From the train the bananas are sent to the warehouses of the banana merchants, and in these huge sheds the unripe bunches of green bananas are hung from hooks in the ripening rooms, where by gas heating the green fruits change into ripe, tasty, yellow bananas.

From here the bananas are packed into boxes, and sent to the various fruit shops. It may seem strange, but from the moment that the banana fruit is cut on the plantation until it reaches the fruit-seller thousands of miles away, it is given almost as much care and attention as a new-born baby, because it has to be pampered and coddled so that it gets to the shops and those who want to buy it to eat, in the finest condition.

The banana is one of the finest food that man knows. When it is unripe it contains a lot of starch, and on ripening this starch turns into fruit sugar. The doctors call this fruit sugar by many long names, but they all know that from this fruit sugar which we get by eating bananas, we also get a lot of our energy to help us to work and play hard.

In India we can buy our bananas from three annas a dozen for the cheaper kinds, to a little over a rupee a dozen for the better varieties. But if you were living in a country like England and liked to eat a banana a day, it would cost you quite a bit, as you would have to pay from eight annas to a rupee for each banana. The cost is high as the bananas are grown thousands of miles away and have to come by mule, cart, train, ship and again train, before your fruit-seller can say 'bananas for sale today'.

UNCLE TELLATALE



CHILDREN'S TREAT CELEBRATIONS AT RAILWAY INSTITUTE, BELLARY

The Railway Institute, Bellary celebrated the Annual Children's Treat for 1954-55 on 27-3-1955. Over 1,000 children took part in the treat. All children were given prizes in addition to the special prizes for sports, etc.

Sri S. R. Gorur, District Medical Officer, Government Headquarters Hospital, Bellary, presided over the function and Mrs. Gorur distributed the prizes. The president paid tributes to Indian Railways for organising such functions for children.

Sri S. Ganesan, Chairman, Indian Railway Institute, Bellary, also spoke on the occasion explaining the significance of such treats.

A Tamil drama "Vazhkai Chuzhal" and a Telugu Drama 'Antharwani' were also staged by the members of the Institute, which were much appreciated by the audience.

RAILWAY INSTITUTE, BEZWADA

After a lapse of nearly six years, children's treat was again conducted by the Railway Institute, Bezwada, on 25-3-55, the Telugu New Year's Day.

360 toys and sweets were distributed to the children who participated in the treat. Children's sports were conducted and prizes distributed to winners by Sri K. Nageswara Rao, Hon. Secretary.

The Institute bore a festive appearance throughout the day.

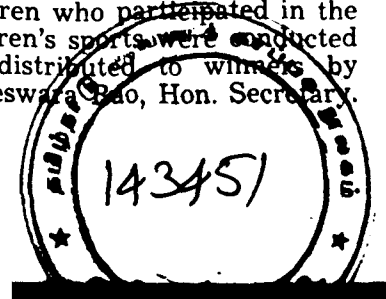
SRI RAMANAVAMI CELEBRATIONS IN THE M.T.S. RAILWAY COLONY AT HUBLI

The residents of the M.T.S. Colony, Southern Railway, Hubli, celebrated Sri Ramanavami festival this year on a grand scale. The celebrations were spread over for four days, commencing from Sri Ramanavami day, i.e., 1st April.

A beautiful illuminated and decorated pandal was erected for the purpose. Besides pooja and bhajan, vocal and instrumental music programme to cater to all tastes were arranged on all the four days. There were kirtans daily by Sri R. V. Kargudri.

A procession accompanied by Nadhaswaram music, was taken through the Colony on Sunday night (3-4-55). The most important item of the programme was the feeding of the poor. Nearly a thousand poor people were fed on that day.

Liberal contributions in cash and kind were received by the Celebration Committee headed by Sri K. S. Ramaswamy, Works Manager, Hubli, and this enabled the Committee to arrange for the interesting and entertaining items of the programme. Messages wishing the function success, were received from well-wishers spread over the country.



JL
X415 m21, 1955-56
N 55.2.2.

COTTON YARNS

OF ALL DESCRIPTIONS FOR HANDLOOM, POWERLOOM & HOSIERY FACTORIES

MADURA MILLS COMPANY, LIMITED

Phone: 250 (5 Lines) MADURAI Telegrams: 'HARVEY'
MILLS AT MADURAI, TUTICORIN & AMBASAMUDRAM
5,00,000 Spindles Counts up to 80s

WE SUPPLY:

WARP YARNS, COMBED YARNS, HOSIERY YARNS
CONE, CHEESE & HANK YARNS SINGLE & FOLDED

SPECIALITIES:

YARNS FOR THE MANUFACTURE OF

ROPES - HEALDS - CANVAS - TAPE
BELTING DUCK - TYRE CORD FABRIC - SEWING THREAD
MULTI-PLY & CORD YARNS

MANAGERS:

A. & F. HARVEY LIMITED

Phone: 420 (4 Lines) 'PANDYAN BUILDING' MADURAI Telegrams: 'HARVEY'
S. INDIA

HEATLY & GRESHAM LIMITED

INCORPORATED IN ENGLAND

CALCUTTA - BOMBAY - MADRAS - NEW DELHI

SOLE REPRESENTATIVES IN INDIA FOR THE FOLLOWING

MACHINE TOOLS

DAVID ETHELLE & SON LTD: Bolt and Nut Manufacturing Machines, Automatic Nut Tapping Machines, Horizontal Forging Machines, Nut Frazing Machines, Etc.

ORMEROD SHAPERS LTD: Shaping & Slotting Machines.

JOHN PICKLES & SON (Engineers) LTD: Band Mills, Saw Benches, Sand papering Machines, Morticing Machines, Planing & Thicknessing Machines, Spindle Moulders, Universal Woodworkers, Veneer & Plywood Machines.

W. E. SYKES LTD: Gear Generating Machines, Cutters & Hobs.

TIMBRELL & WRIGHT (Successors) LTD: Capstan Lathes.

DALLOW LAMBERT & CO., LTD: Dust Control Units.

REX NICHOLS (Tools) LTD: Nut Tapping Machines.

AND OTHER MANUFACTURERS OF MACHINE TOOLS

ALSO FOR: LOCOMOTIVES & SPARES - ROLLING STOCK FITTINGS, TRACK EQUIPMENT & GENERAL ENGINEERING EQUIPMENT.

ANNUAL DAY CELEBRATIONS AT GUNTAKAL

Guntakal witnessed one of the most crowded functions on 21-4-55 when the Annual Day celebrations of the Indian Railway School, Guntakal, were held in the premises of the school. Shri M. Cheluve Urs, Regional Mechanical Engineer, Southern Railway, Mysore, presided over the function and Mrs. Cheluve Urs distributed the prizes.

The function started with a prayer by the school children. Shri R. K. Tyagarajan, Manager and Correspondent of the Railway Schools, and District Mechanical Engineer, Guntakal, introduced the President and Mrs. Cheluve Urs to the audience. The Headmaster of the school presented the President and Mrs. Cheluve Urs with a welcome address on behalf of the staff and the students of the school. The Manager then read the Annual Report of the school indicating the lack of accommodation in the school buildings, resulting in the school having to run on a double shift system and pleaded to the Railway Administration to provide increased accommodation for the children. The school has made creditable performance in the Elementary School Leaving Certificate Public Examination during the year 1954 wherein it secured over 85 per cent passes. In the extra curricular activities, the school fared very creditably and in the recent All Railway Schools Meet at Madras, the Indian Railway School at Guntakal secured second place, winning eleven cups. The manager congratulated the staff of the school on their creditable performance during the year 1954-55 and appealed to them to keep up their performance in the years to come. He also requested the parents of the school children to give their continued co-operation and goodwill to the school. With their co-operation and goodwill, he hoped, the Railway School will grow up into a bigger institution to

cater for the Education of the Railway-men's children.

The President, Sri Cheluve Urs, in his address thanked the school for the honour that has been conferred upon him in asking him to preside over the function and his wife to distribute the prizes. He advised the children that they are going to be the future citizens of this great democratic country. For them to take the rightful place when they grow up, they should cultivate discipline. He congratulated them on their good performance both in the school sport and asked them to keep it up.

There was a series of variety entertainments by the children of the school and it was much appreciated. The president in token of his appreciation also announced four prizes for the best actors on that occasion.

With the vote of thanks of the headmaster, the function came to a close.

NEW ANNEXE TO RAILWAY T. B. SANATORIUM

A new annexe to the existing Railway T. B. Sanatorium at Tambaram, near Madras, is to be built during the current financial year.

The Railway Ministry has sanctioned a sum of nearly Rs. 57,000 for this purpose.

THE INDIAN RAILWAY INSTITUTE OPEN CHAMPIONSHIP FOOTBALL TOURNAMENT-1955

The Seventh Open Championship Football Tournament conducted under the auspices of the Indian Railway Institute, Hubli, from 11th March 1955 came to a successful end on 12th April 1955. 28 teams including 14 Railway Institute teams, 6 Local teams and 8 teams from various parts of South India participated in the tournament.

In the Finals of the tournament played between S.R.A.A. Football team, Madras and the I.R.I. Jalarpet, the former won by a comfortable margin of 4-0 and annexed the trophy. Every one of the S.R.A.A. players was at his best and Gangaraj drew first blood and Thangaraj added the 2nd goal before half time. Lemur the Madras captain converted a penalty kick and got the third goal. Madras completed the tally through Gangaraj. Mathuramuthu under the Jalarpet bar made many spectacular saves and kept the score down. Chandrasekhara the Jalarpet outside right made many moves but had no support from others.

Among the losers in the earliest rounds, the game played by K. G. F. Gymkhana, Kolar, the Southern Ry. Bangalore, Southern Railway Mysore, and the Indian Railway Institute Golden Rock was of a high order and attracted a good crowd.

Daily 1,000 spectators witnessed the matches and on Finals nearly 3,000 gathered. On the 12th April after the Finals, the trophy and prizes were distributed by Srimathi Ramachandran at a function presided over by Dr. G. S. Ramachandran, District Medical Officer, Southern Railway, Hubli.

The Tournament Managing Committee headed by Sri K.S. Ramaswamy, Works Manager, Hubli, as the Chairman, with Messrs. P. R. Narayan and F. X. Raju as joint Secretaries, made all the arrangements satisfactorily.

SOUTHERN RAILWAY BHARAT SCOUTS AND GUIDES

The Rover Recruits of the Netaji Scout Group camped at Malayalathan Thottam on the 19th and 20th March 1955. They had intensive training in camping—theory and practice—from the Rover Mates. The Scout Group and the Cub Pack of the same group paid a visit to the Camp on the afternoon of the 25th and had a jolly good time with games, sing-song and entertainment.

20 Rover Scouts of the Netaji Scout Group had a ramble on bicycles to Poondi from 7th to 10th of April 1955. They visited Poondi Reservoir, Thiruppachur Fort and Temple, the Stoneware Factory at Trivellore, Ekkadu Industries, School and Hospital, Trivellore Temple, Tirur Agricultural Research Station and Basic Model School and returned to Madras via Red Hills.

The Vivekananda Scout Group have started issuing a monthly Bulletin containing very useful articles on Scout Craft.

PERUR—OR 'MEL' CHIDAMBARAM

(Continued from page 45)

worship, the deity was unwilling to receive him. After warning the bull, Nandi, not to disclose his hiding place, the deity went to an adjoining field and hid himself. The devotee arrived at the temple and, not seeing the idol, felt sad and disappointed. When he questioned Nandi as to where the Lord had gone the former refused to say anything, but when the saint threatened to punish him with a curse, Nandi got frightened and turned his head to the direction in which the Lord had gone. When the Lord came to know what had happened, he took Nandi to task for disobeying his orders and punished him by cutting off a portion of his lower jaw. There is an annual festival to mark this incident.

The River Noyal on the banks of which the temple stands is considered very holy by the Hindus. It is favoured by the people of Coimbatore for morning baths in the month of Aippasi (October/November). It is a very common custom with the Hindus of the town and adjoining districts to throw the bones of their deceased relatives in this river, and the belief is held that the bones turn into hard stone owing to the sanctity of its waters.

Lepakshi

Little known Shiva-Vishnu Shrine

G. Runga Raju

IN a country like ours, which has its history stretching back to centuries, unwritten for a greater part, it can only be reconstructed, by a study of the great works of Art and other positive evidence—seals, coins and the like—left behind by successive generations and these works found expression, mainly in temple buildings and partly in royal palaces, in which architecture, sculpture and painting were combined, with changing emphasis on the one or the other. In this chequered history of centuries, we find progress and retrogression—political upheavals, religious turmoils and exuberance as well as decadence in Art—which have left their impress on

this evidence—monuments and others—mute, but none-the-less eloquent exponents of the greatness of our past. The advent of the British regime and the Railways in its wake have been responsible to some extent in bringing about the decay of the formerly well-known places, where these monuments stood, by the shift in trade and industry to places closer to the railways and centres of civil administration. Halebid and Belur, near Hassan, in the State of Mysore—the former, the seat of Hoysala Rulers at one time, having temples, with exquisite specimens of architecture and sculpture—are now no more than museum specimens. So also is LEPAKSHI—

Present entrance to the temple

(Photo: G. S. Raju)



about 9 miles, east of Hindupur Railway Station, in Andhra State, on the Bangalore-Guntakal Section of the Southern Railway, about which it is proposed to have a brief survey, for bringing it to the notice of the tourists, who are inclined to include it in their itinerary. A visit to LEPAKSHI is to read the history of the 16th century of that part of the country, not from books, but from the monuments of Art left behind by our forefathers with a spirit of devotion and effacement of self, whose greatness is no less praiseworthy than the present day inventors of the H-Bomb.

LEPAKSHI is now a small village with hardly 3,000 inhabitants, blissfully lacking in the present-day refinements. Buses, however, run between Hindupur and the village and the visitors have to keep their haversacks full, for the day's outing. It has a temple, in which Sri Papa Nasa Lingeswara and Sri Raghunathaswamy

smile at each other in juxtaposition—one of the few temples in the country, where Shiva and Vishnu are together. Sri Virabhadra is also installed here, indicating a fusion of Vaishnava, Saiva and Veerasaiva concepts of faith.

It was built in 1538 A.D. by a shroff Virupanna of Penukonda, who was under the service of Achuta Raya of Vijaynagar. The Temple stands on an elevated mound, enclosed by an outer wall. Inside it are pillared cloisters on all sides, intended for visitors to rest. The main shrine is reached through the unfinished Kalyana Mantapam on the East and Mahamantapam on the North, which is the finest part of the temple. It is supported by 66 pillars, of which the central series bear almost life-size representations of musicians and dancers carved on them and the outer rows are ornamented with equally well-executed, but smaller figures.

Unfinished Kalyana Mantapam on the west



(Photo: G. S. Raju)

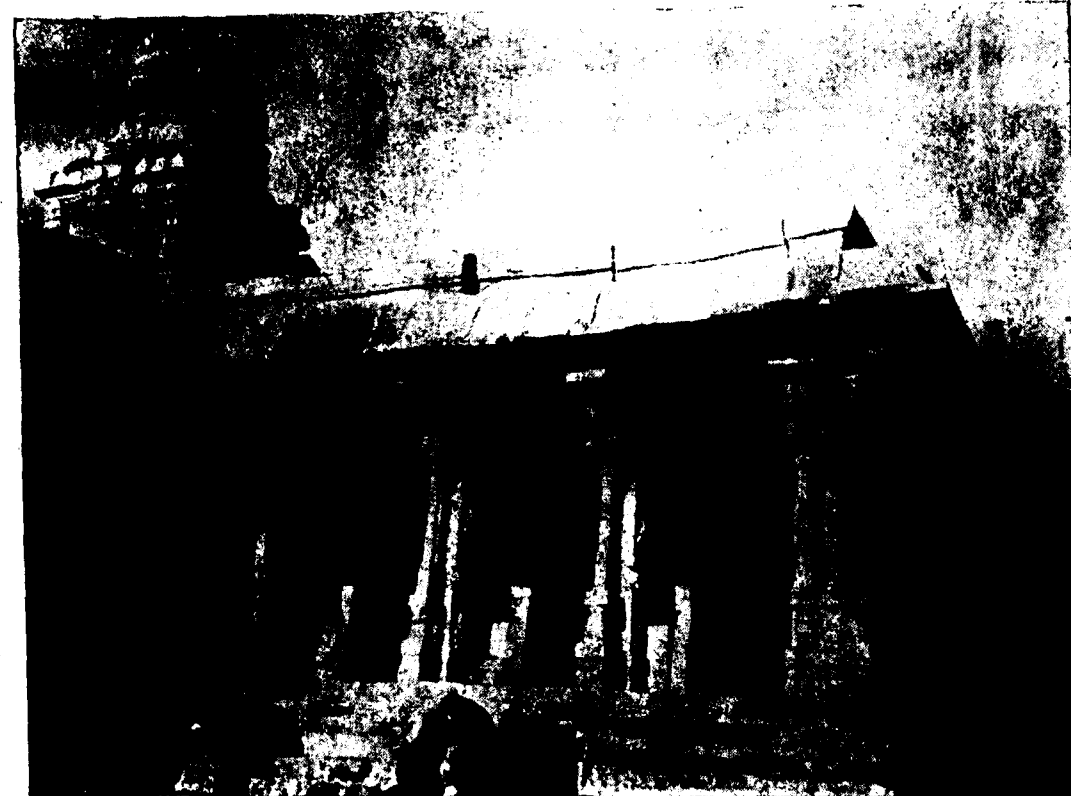
Two of the pillars in this Mantapam have only one corner resting on the ground. It is stated that "the temple attendants used formerly to declare that they did not touch the ground at all, but were suspended from the roof and demonstrated its truth by passing a cloth underneath them, managing the matter so adroitly, that the cloth seemed really to pass right under the whole of the pillars. They now admit that one corner of each rests on the flooring, but allege that this was because a European Engineer, who was examining to see how they were suspended, injured them in the course of his experiments and caused them to sink." This Mahamantapam has another distinctive adornment, which makes it unique: numerous life-size paintings of scenes from Mahabharata, Ramayana and the Puranas cover the inside of the entire roof, displaying

the wonderful skill and endurance of artists, who had to paint lying on their backs all the time, on a platform improvised for the purpose and also the technique of colour manufacture over 500 years ago. One of the faces possesses the unusual characteristic of appearing to look full at the spectator, from whatever angle from which it is viewed. Another piece of sculpture is the figure of a man leaning his chin upon his hands, which is said to be a Kuruba (shepherd) who was the mediator between the builder of the temple and his workmen in a dispute about wages.

The unfinished Kalyana Mantapam contains some exquisite specimens of carvings. And this structure has a gruesome memory. Virupanna, who was building it, was charged by the Ruler for misappropriation of Government money for its construction.

Mahamantapam on the north

(Photo: G. S. Raju)



Overcome with ignominy, for incurring the displeasure of the Ruler, Virupanna is stated to have gouged his eyes and threw them on the wall close by. He did not survive long after his self-immolation and the Kalyana Mantapam remains, where he left it. Appropriation of state funds for building a temple, as in this case, has an analogue in Sri Rama Das renovating Sri Rama's Temple at Bhadrachellam in Hyderabad State; but the punishment in that case is said to be 12 years of imprisonment, ending in a happy denouement, unlike Virupanna's tragic end.

To the south of the main shrine is a huge Nagalingam, shrouded by a 7 hooded serpent, cut out of a solid rock, on a massive granite base. A huge Bull—Basaveswara—carved out of a monolith measuring about 20 feet high and 30 feet long is another wonderful piece of workmanship in carving, lying to the east of the temple.



This pillar in the Mahamantapam is not resting on the ground

(Photos: G. S. Raju)

A huge Nagalingam



LEPAKSHI temple is, apparently, a class by itself and it deserves to be seen, to be appreciated fully. Its architectural magnificence is largely influenced by the Chalukyan style, which reached perfection in the neighbouring state of Mysore, during the three centuries—1000 to 1300 A.D.—under the sway of Hoysala Ballalas. Several temples stand to their credit, of which, those at Halebid and Belur, near Hassan, and at Somnathpur, near Mysore, are remarkable specimens. In describing the porch of the temple at Belur, Ferguson in his "Indian and Eastern Architecture" says that "the amount of labour indeed, which each facet of this porch displays is such, as I believe, never was bestowed on any surface of equal extent in any building in the world".

Shrines, like LEPAKSHI abound in this country, many of them away

Unique life like colour paintings adorn the entire roof of Mahamantapam
(Photos: G. S. Raju)



from the rail-heads, noted for their architecture and sculpture, worthy of emulation by the present-day builders, in preference to the ugly and alien abominations in reinforced concrete. For this, an up to date and complete survey of all these works in a handy form, fully illustrated, appears to be as urgent as the authentic History of this country, now under preparation. Equally important is their renovation in time for preservation of the original structures in tact, having in view how the growth of unwanted plants ruined one of the finest specimens of architecture at Halebid. That was, perhaps, before the Ancient Monuments Preservation Act was passed, for which Lord Curzon will, ever, be remembered in this country. Above all, the descendants of the Master-Craftsmen, who built them may still languor for want of patronage. If 'monuments' are to be resuscitated, what of these descendants—the chips of the old blocks?

A huge Bull-Basavarava



Special Rates

V. K. Sthanunathan
District Commercial Superintendent (Rates)

A special rate is a station-to-station rate which has been defined in Section 46(C) of the Indian Railways Act as under :—

“Station-to-station rate” means “a special reduced rate applicable to a specific commodity booked between two specified stations.”

It is, therefore, a lump sum rate and usually covers all charges, including transshipment, terminal, short distance charges, etc. These rates mostly apply only to wagon load consignments, with specified minimum weights. Usually, it is quoted as a ‘per maund’ rate and occasionally, as a lump sum ‘wagon rate’ based on the loadability of wagons.

Section 46 of the Indian Railways Act gives authority to the Railway Administrations to quote station-to-station rates. I am quoting below the relevant section :—

“46. Alteration and Cancellation of certain station-to-station rates.—Notwithstanding anything contained in this chapter, a railway administration may, in respect of the carriage of any merchandise by goods train,

- (i) quote a new station-to-station rate; or
- (ii) increase or reduce an existing station-to-station rate, not being a station-to-station rate introduced in compliance with an order made by the Tribunal; or
- (iii) after due notice in the manner prescribed by the Central Government, cancel any station-to-station rate which has not been introduced in compliance with an order made by the Tribunal, unless the Tribunal has, after notice has been given as aforesaid, granted an injunction against such cancellation; or
- (iv) withdraw, alter or amend the conditions attached to a station-to-station rate other than conditions

introduced in compliance with an order made by the Tribunal.”

As you are all aware, the Railway Board have delegated powers to the Railway Administrations in regard to the quotation of special rates, which are as follows :—

Class.	Wagon load scales.	Limit of reduction.
	WL/A & WL/AR	No reduction.
	WL/C, WL/CR & WL/CQ.	20% or upto 20 pie per maund per mile, plus terminals whichever gives the higher rate per maund.
1 to 6 both inclusive.	All other wagon load scales.	40% or upto 20 pie per maund per mile, plus terminals whichever gives the higher rate per maund.
7 to 15 both inclusive.	..	Upto 50%.

Note.—No reduction should be made in the terminals. Short distance charge may be foregone either partly or in full, according to the merits of the case.

It is necessary that the F.A. & C.A.O.'s concurrence is obtained before any special rate is quoted, revised or cancelled. If any special rate, which exceeds the rate reducing powers of the railways as mentioned above, is to be quoted, the approval of the Railway Board is necessary.

Special rates are quoted to meet the requirements of special circumstances, because classification rates are highly generalised. They are made to fit the individual commercial needs of producers and consumers interested in particular commodities. “They represent an intimate give-and-take between railroads and particular industries, not provided by the class rate structure which tries to meet the more general needs of commerce as a whole.” The grant of a specially reduced rate is a means of economic

May 1956

SPECIAL RATES

63

assistance to a trader or class of traders and because a citizen or a group of citizens are allowed thereby a measure of pecuniary advantage beyond what the generality of citizens enjoy, the grant of a station-to-station rate should be governed by sound principles that are capable of universal application. While Railway Administrations have the discretion under Section 46 of the I.R. Act to quote a reduced special rate, at the same time, a check on an arbitrary and unjustified exercise of the discretion is provided by Section 41 (2) (i), viz.:—

“Whenever it is shown that a railway administration charges one trader or class of traders or the traders in any locality lower rates for the same or similar animals or goods, or lower rates for the same or similar services, than it charges to other traders or classes of traders, or to the traders in another local area, the burden of proving that such lower charge does not amount to an undue preference shall lie on the railway administration.”

The Railway administration should be able to explain if called upon to do—the circumstances necessitating the quotation of a special rate and these circumstances should be related to sound rating principles.

Before examining the circumstances in which special rates are quoted by railways, I shall briefly touch on one important point which has completely reorientated the policy of Railways in regard to the quotation of special rates. I am referring to the revision of the Rate Structure in 1948 and the complete nationalisation of all Indian Railways. If one peruses the Tariffs obtaining on Railways prior to 1-10-48 one would be struck by the large number of station-to-station rates, station-to-station rates from one station to via a junction, and indefinite special rates from via one junction to via another junction. Most of these were very uneconomical rates and involved wastefully long haulages. All this was because each individual railway

or railway company wanted to increase the lead over its portion and there was inter-railway competition for traffic. The Class rates worked on a flat basis and for distant producers it was difficult to move their products without special rates. With the revision and rationalisation of the rate Structure from 1-10-48—with the Central Government running all the Railways—and with the introduction of the telescopic system of rates—thousands of the special rates have been cancelled. Competition between railways is absent in India and there is absolute co-ordination of the rate policies of all Indian Railways. This is a position very different from that in America where carrier competition is very much conspicuous. When therefore we read American text books or Inter State Commerce Commission decisions this background of the different circumstances should be borne in mind.

Let us now examine what are the special circumstances in which the railways usually quote or can quote special rates. They may broadly be divided under the following heads :—

- (i) Stimulation of traffic.
- (ii) Market competition.
- (iii) Development of a new industry or the expansion of an established industry. Closely allied to this is the question of public interest also.
- (iv) Competition by other methods of transport.

Stimulation of Traffic

It is possible by judicious quotation of rates, to develop new traffic on railways. This is on the principle that the particular commodities concerned will not be able to move, but for the quotation of judicious special rates. There are innumerable instances on railways where by suitable station-to-station rates, extra traffic has thus been developed.

In considering this aspect of quotation of special rates, what has to be taken into account is what will be a reasonable rate for the commodity to move. In other words, the basis for the special rate is "the value of service". Value of service means the value of the service to the article, to the consumer and to the public. This will determine the rate level necessary to move a particular commodity and is vital even from the nation's point of view, as any basis of rate which discourages traffic on a saleable commodity and results ultimately in loss of a large part of it, is detrimental to the larger public interest. Conversely, by a suitable rate adjustment, the traffic in particular commodities can be encouraged and stimulated, so that additional traffic is brought to the railways—traffic which, but for the quotation of the special rate, would have been stifled.

What the Rates Officer has to bear in mind in considering such rates is whether the particular movement which he wants to stimulate, is on a section and in a direction where there is capacity and facility to move. For example, it may not be worthwhile to stimulate such traffic on an already saturated section, where traffic paying at full tariff level that is offering, is itself not fully cleared. On the other hand, in the non-traffic direction, where empties are being moved in large numbers in order to feed the return traffic, it would certainly be worthwhile stimulating traffic, to mutual advantage. The rate level to be quoted for the commodity will be what the traffic can bear for paying for the rail transportation, based primarily on a consideration of the value of the article and the trader's profit, without a retarding effect upon the volume of movement by rail.

While on this, it is pertinent to consider what would be the floor level of rates that can be quoted by Railways in stimulating such extra traffic, or what Shinn calls 'added traffic'. It is

usually assumed that the out-of-pocket costs for added traffic are about half as great as the cost of handling other traffic, that is the average for the whole traffic. In other words, the dependent costs of operation are assumed to be approximately 50 per cent of the average costs of haul—here it is necessary to take the average cost of hauling a wagon a mile as the most suitable unit for the cost analysis involved. The average cost of hauling a wagon one mile, including interest charges, on the various railways for the year 1951-52 is as follows:—

B.N.	...	96.8	pies
Central	...	92.7	..
E.I.	...	82.6	..
S.R.	...	93.7	..
Western	...	93.9	..

The figures for 1952-53 and 1953-54 for the Southern Railway are:

		B.G.	M.G.
1952-53	...	104 pies	96.1 pies
1953-54	...	107.7 ..	105.1 ..

Taking the Southern Railway's latest figure as an example, the dependent costs of hauling a wagon a mile on the Broad Gauge is 54 pies approximately, and on the Metre Gauge, 53 pies approximately. Assuming an average wagon load of 400 Mds. for the B.G. and 240 Mds. for the M.G., the dependent costs per maund per mile work out to .14 pie on the B.G. and .22 pie on the M.G. It will be seen that for added traffic that would bring extra revenue to the railway in the non-traffic direction the Rates Officers can think of quoting rates which would bring a return above the cost figures mentioned above. The extent of the contribution of such rates to the net revenues will be the difference between the dependent costs and the revenues produced by the rates.

One essential point has also to be mentioned in this connection. I have reduced the cost to the maund mile,

assuming the average wagon load of 400 mds. and 240 mds. for the B.G. and M.G. respectively. Where particular commodities cannot give wagon loads to this extent, the floor level of rates to be quoted will have to be correspondingly changed, in order that Railways may not be out-of-pocket for transporting the traffic.

Market Competition

Closely allied to stimulation of traffic is the principle of market competition. The principal gain from permitting market competition to influence rates is that it allows a freer movement of commodities over long distances. It broadens the market for distant producers and permits consumers to draw from more than one producing area. Increased competition among sellers tends to reduce prices and to protect consumers against shortage of supplies arising from such factors as crop failures due to draught, etc. Basing rates on market competition increases the volume of traffic for railways and is economical if rates are not fixed lower than necessary to meet the competition.

Quotation of special rates for market competition would have created complications, if different railways were owned by different companies or authorities as is the case in America. The railway with the long haul will tend to quote any rate that will more than cover the out-of-pocket costs, irrespective of the business lost by the short-haul railway. In India, however, where all the railways are owned by the Central Government the adjustment of rates according to what the traffic can bear for a long haul will be made taking into full account the repercussions on similar traffic from the nearer sources. As the same railway system serves all points producing a given commodity, less concession will be made to a long haul on account of the larger costs involved and the traffic which affords the greatest margin above favourable costs will be encouraged.

While on this, it will be well to remember that the present telescopic system of rates in vogue in India already recognises this principle that for the distant producer the rates should not increase directly in proportion to the increase in distance. The quotation of special reduced rates is only a further extension of this principle in order to induce further movements.

The principal argument against permitting rates on market competition is that it tends to destroy natural geographical advantages of producers. Where the producers of two localities compete for business in the same territory, discrimination in rates necessarily gives one locality a comparative advantage over the other. Even though the rate for the nearer producer is reasonable so that he can supply part of the market, and though that for the distant producer is higher, the nearer producer suffers to the extent that he is forced to share the market on account of reduced special rates.

It will be worthwhile at this point to consider what view the Railway Rates Tribunal has taken in the matter. In the North Malabar Chamber of Commerce v. the Southern and Eastern Railways (Complaint No. 1 of 1952), Justice N. S. Lokur observed:—

"The first ground of undue disadvantage is said to be that the manufacturers in Northern India have forests in the neighbourhood and as they have the market for tea chests, namely the tea estates, in their vicinity, they have not to pay the high freight which the manufacturers in Southern India have to pay for the transport of shocks. While the factories in Northern India can afford to quote Rs. 7-4-0 as the price of shocks for a plywood tea chest, the factories in Southern India have to quote Rs. 6-12-0 only in order to meet the freight of eight annas. In other words, the latter are not able to earn the same margin of profit as the former. But as observed in RAILROAD COMMISSION OF LA V. ST. L.S.W. Ry. Co. (23 I.C.C. 31 at p. 34), 'it is not the function of a railroad to equalise the commercial

advantages of cities'. It is pointed out in *COMMERCIAL CLUB OF OMAHA v. CHICAGO R.I. & P. Ry. Co.* (6 I.C.C. Reports 647) that the general rule is that 'carriers have no right to disregard distance and natural advantages in order to bring about a commercial equality. At page 675, the following passage from an earlier case was cited with approval:—

'It is not the duty of carriers, nor is it proper, that they undertake by adjustment of rates or otherwise to impair or neutralise the natural commercial advantages resulting from location or other favourable condition of one territory in order to put another territory on an equal footing with it in a common market. Each locality competing with others in a common market is entitled to reasonable and just rates at the hands of the carriers serving it and to the benefit of all its natural advantages.'

'If this result in prejudice to one and advantage to another it is not the undue prejudice or advantage forbidden by the statute, but flows naturally from conditions beyond the legitimate sphere of legal or other regulation 2'."

On the contrary, it has been held by Lord Justice Bratt in the *Denaby Main Colliery Co. v. The Manchester Sheffield and Lincolnshire Ry. Co.* (3 R. & C. T. C. 426), that any manipulation of rates by a carrier to take away the advantage of locality would amount to undue preference. He said (at p. 444):—

"I think that where you find two collieries are so placed that one is at a much larger distance than the other, and where the question is what is to be the rate of payment from each of them to the same point, the mere fact of the same charge being made to both to the same point, one being from a larger distance than the other, is *prima facie* evidence of an undue preference. It is bringing the colliery which is naturally at a greater distance, practically as a money matter at the same distance as the other, whereas under ordinary circumstances the one which is nearer to the given point, which is the market, would be able to carry its goods to

that market at a cheaper rate, and therefore be enabled, according to the ordinary rule of trade, to sell at a lower price, and so get a preference. By bringing the other, which is naturally at a larger distance in point of money to the same distance, you do give that which is at the larger distance a money preference over the other, and a market preference over the other, and you take that natural preference from the one which had a natural preference, and so prejudice it."

What is meant in these citations is that geographical advantages should not be nullified, or in other words, the charges to a larger distance should not be unduly depressed so as to bring it on a par with or below the rates for the shorter distance for similar movements. That is, the former should always be more than the latter, but need not necessarily be higher in proportion to the distance.

The judgment in the *Cast Iron Pipes case*—(*The Engineering Supplies Co. v. Southern Railway and Others* in Complaint No. 2 of 1952) makes the position in regard to this absolutely clear. In this case, there was a special rate of Rs. 1-6-10 per maund from Bisco to Bombay for a distance of 1155 miles and a special rate of Rs. 1-3-6 per maund for a distance of 643 miles from Bhadravati to Bombay. For the lower distance, there was an advantage in freight of As. 3-4, but there was no proportionate reduction in relation to the reduced distance for carriage. The view of the Railway Rates Tribunal was—I am quoting from Justice Lokur's judgment—"Ripley rightly points out that it is the chosen function of transportation agents, by rail and water, to ensure this result—to preserve an equality of prices, despite the variety of producing and consuming conditions. In railway parlance this is what is known as "keeping every one in business". The effect of special rates is "not to create difference of opportunity between individuals, but to generalize

(Continued on page 50)

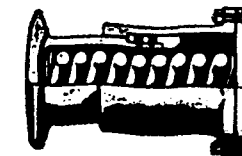
The Public are Travelling in
Greater COMFORT and Greater SAFETY



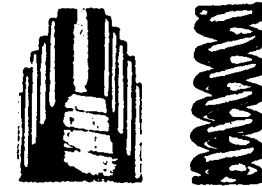
TO THE INDIAN RAILWAYS

In the Supply of:—

WELDLESS
FORGED
STEEL
BUFFERS



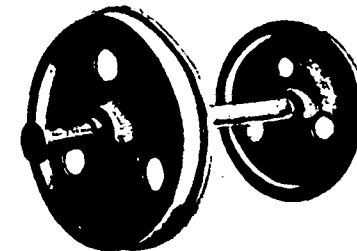
HELICAL
& VOLUTE
SPRINGS



Manufactured by:

George Turton, Platts & CO., Ltd., Meadowhall Road, Wincobank, Sheffield.

WHEELS
and
AXLES



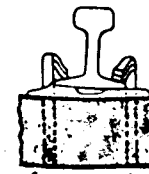
LAMINATED
SPRINGS

Manufactured by:

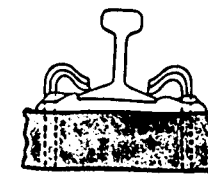
ILVA Aiti Forni e Acciaierie D'Italia, Via Corsica, 4-Genova (Italy).

ELASTIC RAIL SPIKES

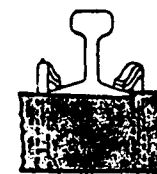
give resilience to absorb vertical rail movement. Rail creep is eliminated and track maintenance costs are reduced.



Single shoulder
baseplate



Double shoulder
baseplate



without
baseplate

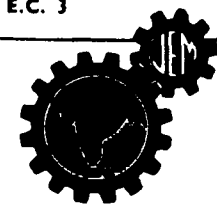
Manufactured by:

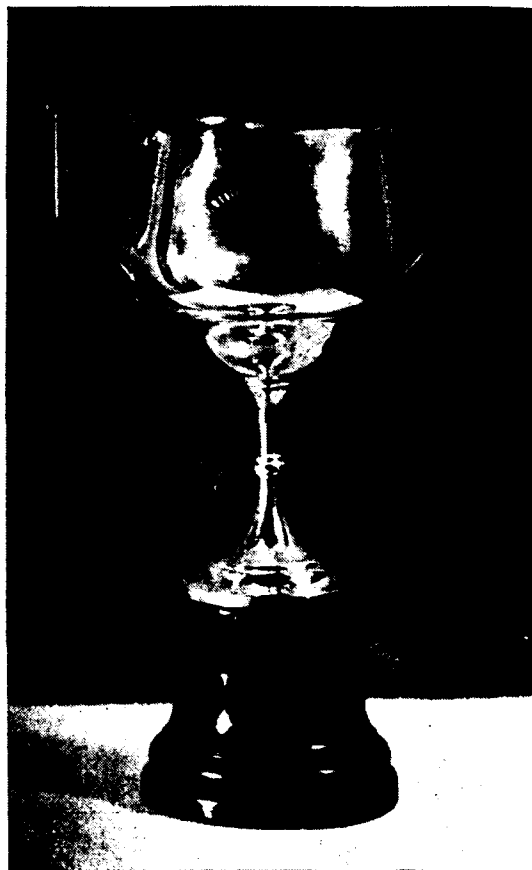
Elastic Rail Spike Co., Ltd., 117, Fenchurch Street, London E.C. 3

Sole Agents

J. N. MARSHALL & CO.

(Jeejeebhoy Nanabhoy Marshall)
5, WALLACE STREET, FORT, BOMBAY I.





*Trophy awarded to the Southern Railway
Stall in the Congress Exhibition held
recently at Bangalore*

SOUTHERN RAILWAY

TENDER NOTICE

Tenders for Manufacturing, Supply and Erecting R.C.C. fencing for North-East Line, Operational Facilities Works at Stations on Madras-Bezawada Section—Bezawada District

The Regional Engineer, Southern Railway, Rayapuram, Madras-13, invites Sealed Tenders for the above work upto 12-00 hours on Friday the 10th June 1955. Only recognized Engineering Contractors who have specialized in R.C.C. works need tender.

Tenders should be submitted in the prescribed form obtainable from the Office of the Regional Engineer, Southern Railway, Rayapuram, Madras-13, on production of a receipt for the amount of Rs. 10 (Rupees Ten only) paid to the Chief Cashier, Southern Railway, Madras-3, Regional Accounts Officer, Trichinopoly or Mysore, towards the cost of the form. Extra copies of the form can be had, if available, on payment of Rs. 2 (Rupees Two only) each. In no circumstances will the cost of the tender form be refunded. The tender form is not transferable.

Tender forms will be issued upto 15-00 hours on Monday the 6th June, 1955.

Earnest money of Rs. 2,700 (Rupees Two Thousand and Seven Hundred only) should be paid in advance to the Chief Cashier, Southern Railway, Madras-3, Regional Accounts Officer, Trichinopoly or Mysore not later than 12-00 hours on Tuesday the 7th June, 1955. The tenderers are requested to supply full particulars of remittance with the remittance itself in all cases to avoid delay.

The amount of earnest money is based on 5 per cent of the estimated cost of the work while security deposit amount is calculated at 10 per cent of the value of the work based on the accepted tender.

Tenderers are required to submit Income-tax Clearance Certificate along with the tender.

The tenders will be opened at 12-00 hours on Saturday the 11th June, 1955 at the Office of the Regional Engineer, Southern Railway, Rayapuram, Madras-13.

The total approximate value of the contract is Rs. 53,000.

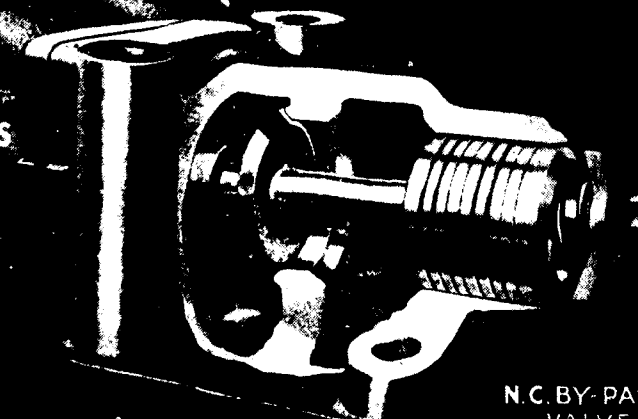
The Regional Engineer reserves to himself the right to reject any or all tenders without assigning any reason.



*Sir M. Visvesvaraya inspecting a model in the Southern Railway Stall
in the Congress Exhibition at Bangalore*

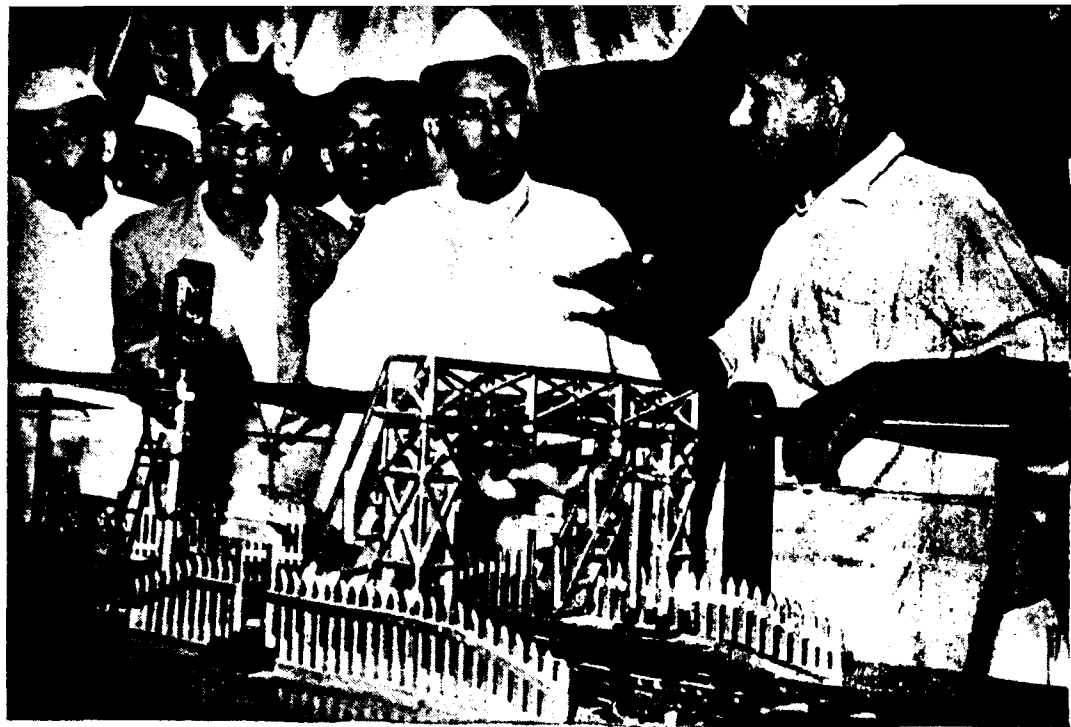
WOTA LOCOMOTIVE EQUIPMENT

- N.C. (NON-CHATTER) BY PASS VALVES
- JOCO REGULATOR VALVES
- I.R.S. BUFFERS
- WOTA BUFFERS



N.C. BY-PASS
VALVE
FOR LOCOMOTIVES

WOTA (INDIA) LIMITED,



The Chief Minister of Mysore, on a visit to the Southern Railway Stall in the Congress Exhibition at Bangalore

May 1955

S. R. NEWS

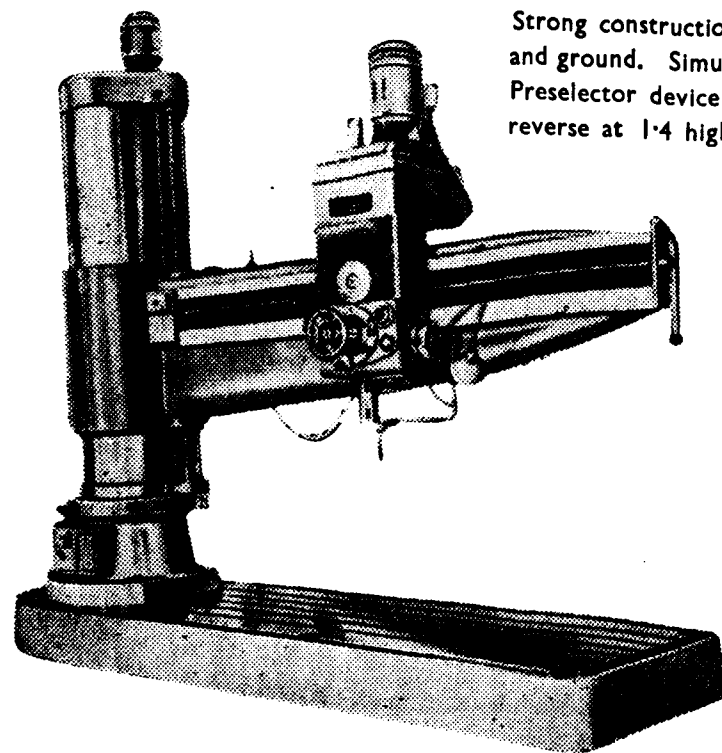
71



*Chi. M. N. Mathurbootham
(Clerk, P.R.O.'s Office), and
Sow. Janaki
who were married on 18-4-55*

»» TECHNOIMPEX ««

HEAVY DUTY RADIAL DRILLING MACHINE MODEL RH 5



Strong construction, gears and spline shafts hardened and ground. Simultaneous clamping of saddle and arm. Preselector device for spindle speed and feed. Tapping reverse at 1.4 higher speed through multi disc clutch.

Drilling in steel	3.5/32"
Tapping in steel Whit.	3"
Length of arm	10 ft.
21 spindle speeds	15 to 1500 r.p.m.
Drill spindle motor	12 HP.
Drilling in C. I.	4"
Spindle nose	M. T. 5
Travel of saddle on arm	8' 4"
18 feeds	.0012 to .079 per rev.
Nett Weight	30,800 lbs.

Agents: Western & Southern India



Branches: Cox St., COIMBATORE.
26 Errabalu Chetty St., MADRAS

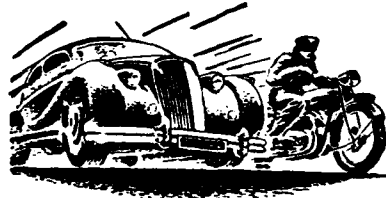
ANNOUNCEMENT

EASY INSTALMENT SALE

The Management of Messrs Kishinchand Chellaram have decided that credit is to be allowed to employees of the Madras State and Central Governments in the city and mofussil for purchases effected at their branch at No. 71/72, Rattan Bazaar, Park Town, Madras, during the ensuing Sale commencing from 2nd May 1955 to the extent of a month's basic salary. This facility will be available only to those Government employees whose basic salary is Rs. 100 and above. They will be allowed to pay for their purchases in four equal instalments, the first instalment being payable at the time of the purchases and the balance in three equal monthly instalments on the fifth of the succeeding months. If in the first instance the payments are regular this credit facility will be given on other occasions also and such persons will be treated as our regular constituents. If any of the instalments is not paid when becoming due the entire balance will become payable immediately and the Management will be entitled to recover the said amount with interest at 12 per cent per annum until payment. The employees residing in the city should apply in writing in person and those in mofussil by post accompanied by a certificate from the head of the department regarding their basic pay, etc., together with an advance of 25 per cent being the amount of the first instalment. A form will be given for filling the particulars before allowing credit to both city and mofussil employees. The Management reserve their right to refuse to allow credit without assigning any reason whatsoever.

KISHINCHAND CHELLARAM
71/72 RATTAN BAZAAR MADRAS

Castrol always leads!



- 1 ST IN 1935**
with an additive to reduce cylinder wear
- 1 ST IN 1935**
with a mild detergent to clean the engine
- 1 ST IN 1938**
to announce lighter oils for easy starting, quick getaway and petrol economy
- 1 ST IN 1949**
with improved inhibitors to protect the oil itself
- 1 ST IN 1951**
with hypoid axle oils containing an anti-scuffing additive and rust and corrosion inhibitors
- 2 ND TO NONE!**
The world's most modern motor oil today with all the latest technical advances giving even better starting and still less wear, especially in the coldest weather

G. C. WAKEFIELD & CO. LTD.

C. 73

SOUTHERN RAILWAY

TENDER NOTICE

Tenders for "Tenali—Remodelling of Yard—Bezawada District"

1. The Regional Engineer, Southern Railway, Rayapuram, Madras-13, invites sealed percentage schedule tenders for the above work to reach him not later than 12-00 hours on Wednesday, the 8th June, 1955.

2. Tenders should be submitted in the prescribed form, obtainable from the Office of the Regional Engineer, Southern Railway, Rayapuram, Madras-13, on production of a receipt for the amount of Rs. 10 (Rupees Ten only) paid to the Chief Cashier, Southern Railway, Madras-3, Regional Accounts Officer, Southern Railway, Trichinopoly or Mysore, towards the cost of the form. Extra copies of the form can be had, if available, on payment of Rs. 2 (Rupees Two only) each. In no circumstances, will the cost of the tender form be refunded. The tender form is not transferable.

3. Tender forms will be issued upto 15-00 hours on Friday, the 3rd June, 1955.

4. Earnest Money of Rs. 10,200 (Rupees Ten Thousand and Two Hundreds only) should be paid in advance to the Chief Cashier, Southern Railway, Madras-3, Regional Accounts Officer, Southern Railway, Trichinopoly or Mysore, not later than 12-00 hours on Saturday, the 4th June, 1955. The tenderers are requested to supply full particulars of remittance with the remittance itself in all cases to avoid delay.

5. The amount of earnest money is based on 5 per cent of the Estimated Cost of the work, while security deposit amount is calculated at 10 per cent of the value of the work based on the accepted tender.

6. Tenderers are required to submit Income-tax Clearance Certificate along with the tender.

7. The tenders will be opened at 12-00 hours on Thursday, the 9th June, 1955, at the Office of the Regional Engineer, Southern Railway, Rayapuram, Madras-13.

8. The total approximate value of the contract is Rs. 2,04,000.

9. The Regional Engineer reserves to himself the right to reject without assigning any reason any or every tender or part thereof and does not bind himself to accept the lowest or any tender or part thereof.

Building a New India

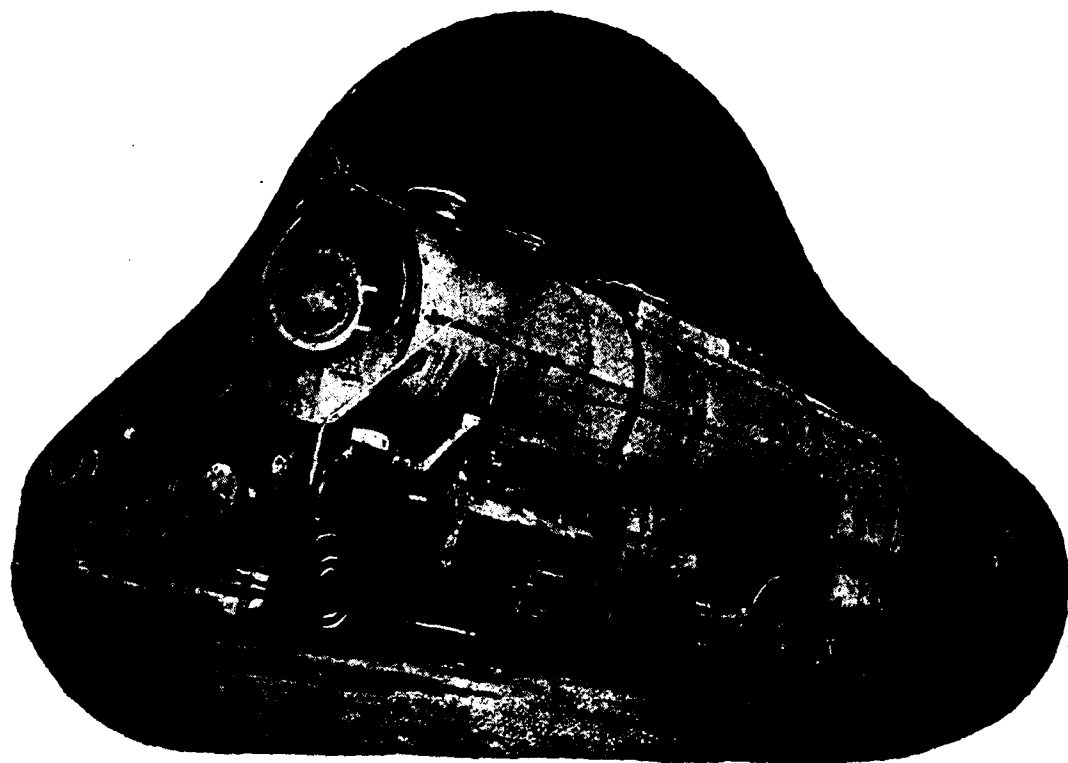
(I) Chittaranjan Locomotive Works:

Railway engines are now being manufactured at the Chittaranjan Locomotive Works in Bengal. The 200th Locomotive manufactured at Chittaranjan was driven out by our President, Dr. Rajendra Prasad, on 27th April, 1955.

Inside view of the erecting shop

(Photo: I. & B. Ministry)





One of the Locomotives manufactured at Chittaranjan (Photo: I. & B. Ministry)

Lamps • Cables • Telephones

Electric Power Cables
Telephone Cables
V. I. R. and P. V. C. Cables
Electric Lamps
Fluorescent Lamps
Lighting Fittings

Elliott Bros. Instruments and
Heat Control Apparatus
Primary Cells and
Batteries
Telephone and Telegraph
Apparatus

**SIEMENS
BROTHERS**

CALCUTTA BOMBAY DELHI
MADRAS AGENTS
BINNY & CO. (MADRAS) LTD.

(II) Sindri Fertiliser Factory :

The Sindri Fertiliser Factory in Bihar is the largest factory of its type in Asia with an average daily production of one thousand tons of Ammonium Sulphate.



A general view of the Sindri Fertiliser Factory

(Photo: I. & B. Ministry)

a

BELT

for

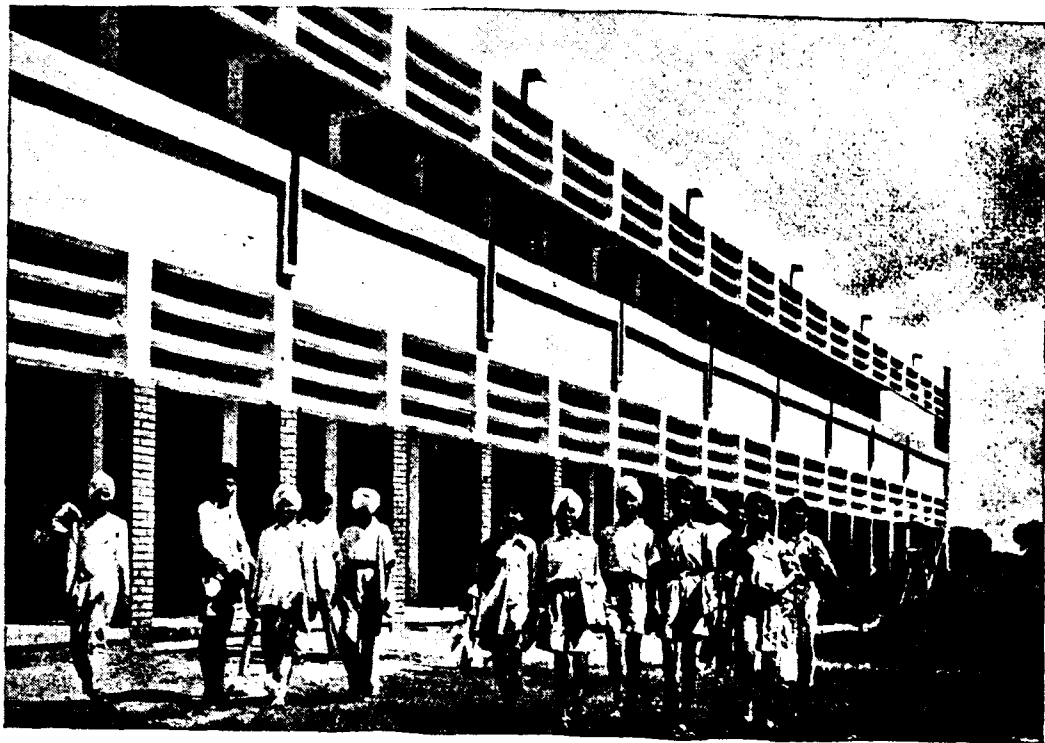
any

job

GOOD YEAR

(III) Chandigarh :

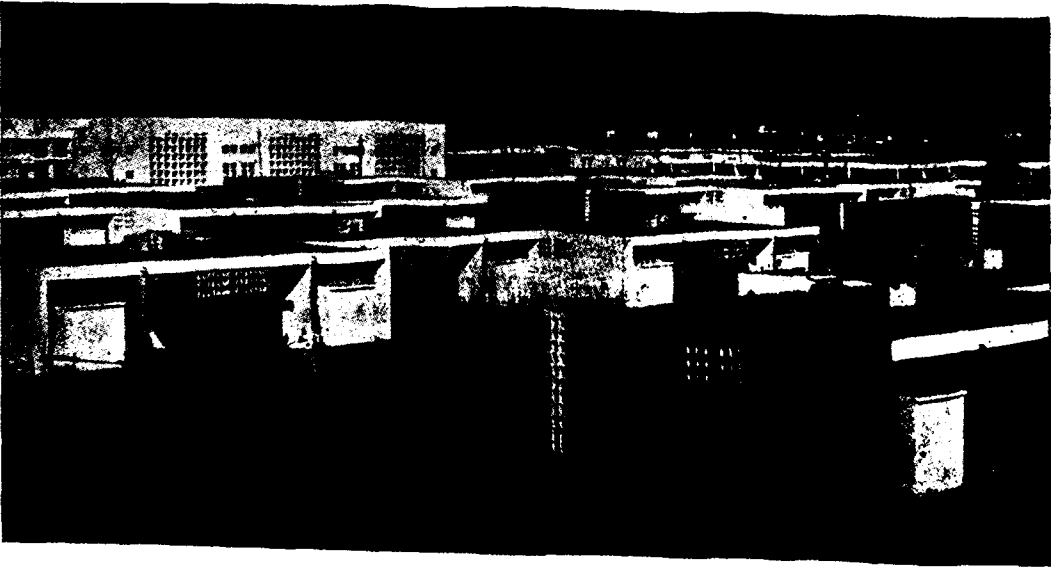
Lying at the foot of the Simla Hills. Chandigarh is the new Capital of the Punjab. Built during the last five years, it is one of the best planned cities in the East.



Boys going back from school in Chandigarh

A panoramic view of Chandigarh

(Photo : I. & B. Ministry)



Commercial Newsletter

Earnings

The approximate earnings on originating traffic, for March 1955 compare as under with those for the corresponding period of the previous year.

(Figures in thousands of rupees)			
MARCH			
	Rs.	Rs.	
Passengers	... 1,46,81	1,48,38	
Other Coaching	... 29,13	32,72	
Goods	... 1,69,47	1,86,35	
Sandries	... 7,36	10,46	
	3,52,77	3,77,91	

Compensation Claims

The following is an analysis of the position regarding compensation claims for the month of March 1955 :—

(1) Number of compensation claims received during the previous month	...	3,539
(2) Number of claims disposed off and the amount paid during the previous month	...	3,906
	Rs.	2,27,342-10-10
(3) Number of claims outstanding at the commencement of the month	...	3,617
	at the end of March 1955	
(4) Number of days taken to settle a claim	...	39 days

STAFF NEWS

GENERAL MANAGEMENT

1. Shri A. V. Subramaniam, APO/Loco Works/PER (J.S.), has been promoted to officiate as RPO/RPM (S.S.) with effect from 11-4-55.

2. Shri T. Venkateswara Rao, Offg. APO/Engg., has been posted as Offg. APO/Loco Works/PER with effect from 11-4-55.

3. Shri T. V. Madhav, APO, on return from leave is posted to officiate as PO/PER (S.S.) with effect from 18-4-55.

4. Shri S. Balasubramanian, ACO/MAS, has been posted as Offg. XO/MS (S.S.) with effect from 7-4-55.

CIVIL ENGINEERING DEPARTMENT

1. Shri K. Sr. kantiah, Offg. AEN/BAY, has been posted as Offg. Asst. Sleeper Passing Officer/MAS with effect from 17-3-55.

2. Shri N. Madhusoodanani Pillai, Offg. Asst. Sleeper Passing Officer, MAS has been posted as Offg. AEN/DO/TPJ with effect from 1-4-55.

SIGNAL ENGINEERING AND TELE-COMMUNICATIONS DEPARTMENT

1. Shri K. Ramaswamy Iyengar, ASTE/Signals/TPJ, has been posted as ASTE/Tele-Com/TPJ with effect from 11-4-55.

2. Shri S. N. Sultan Mohamood, CI (Com.) (Class III), has been promoted to officiate as ASTE/Signals/TPJ in Class II service with effect from 11-4-55.

TRANSPORTATION (TRAFFIC) AND COMMERCIAL DEPARTMENT

1. Shri R. S. Amritharaj, ACS/MSB, has been posted as ACS(C)/MAS with effect from 1-4-55.

2. Shri S. S. Viswanathan, ATS/MS, has been posted as AOG/TPJ with effect from 7-4-55.

3. Shri S. G. Raman, AOG/TPJ (J.S.), has been promoted to officiate as S.O. (G)/MAS (S.S.) with effect from 9-4-55.

4. Shri S. Ramakrishnan, Offg. RPO/RPM, has been posted as Offg. DTS/SBC with effect from 15-4-55.

FELCO HOISTS LTD., ENGLAND

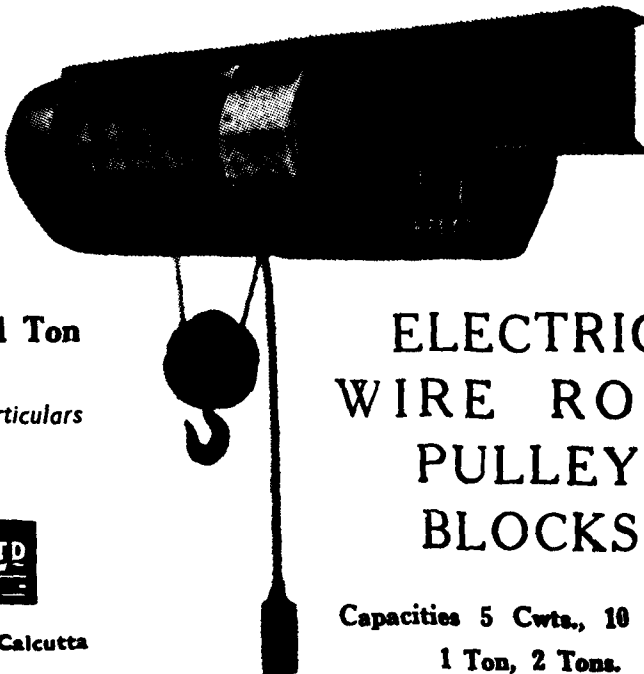
**ELECTRIC
CHAIN
BLOCKS**

Capacity $\frac{1}{2}$ Ton & 1 Ton

Please write for full particulars
to the Agents:—

JESSOP & CO. LTD.
ENGINEERS

63 Netaji Subhas Road, Calcutta



**ELECTRIC
WIRE ROPE
PULLEY
BLOCKS**

Capacities 5 Cwts., 10 Cwts.,
1 Ton, 2 Tons.

Helping in an important job...

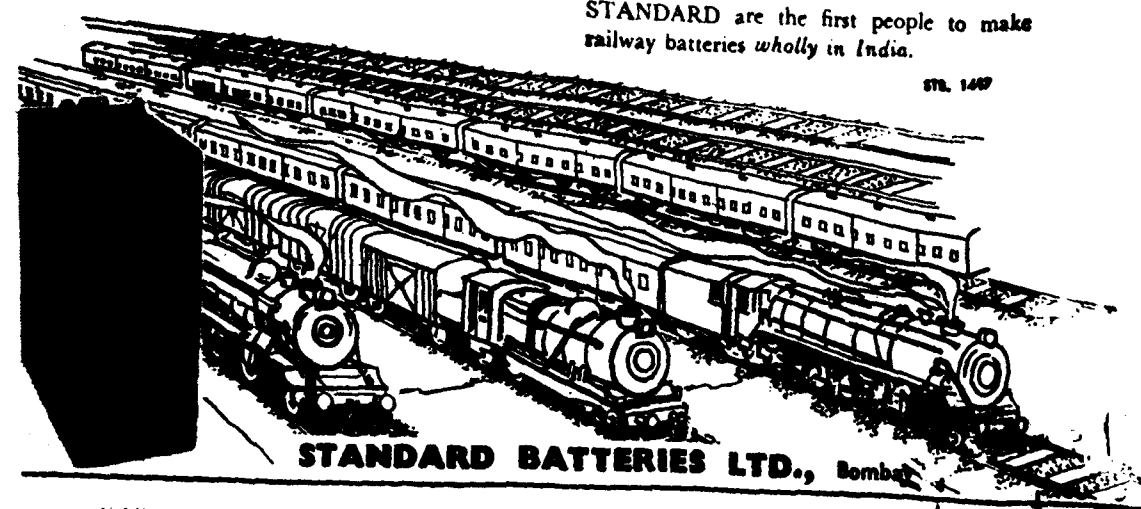
Standard
TRAIN-LIGHTING BATTERIES

EVERY DAY, Indian Railways carry well over 3 million passengers. Keeping these passengers comfortable every day, 24 hours a day, is one of the Railways' many tasks.

STANDARD batteries play a great part here. Hour after hour, day after day, they work the fans, lights and air conditioners on trains.

STANDARD are the first people to make railway batteries wholly in India.

STB. 1409



STANDARD BATTERIES LTD., Bombay

May 1955

STAFF NEWS

79

MEDICAL DEPARTMENT

1. Dr. P. R. Balakrishnan, Offg. AMO, on leave, is permitted to return to duty on 11-4-55 A.N. and has been posted as Offg. AMO/PER with effect from the same date.

STORES DEPARTMENT

1. Shri N. Venkatasubramaniam, ACOS (GSD)/PER, is promoted to senior scale and posted as Offg. DCOS (GSD)/PER with effect from 4-4-55 vice Shri Chinnappa, proceeded on leave.

2. Shri S. Krishnamurthy, DSK, is promoted to Class II Service and posted as Offg. ACOS (GSD)/PER with effect from 4-4-55 vice item 1.

3. Shri M. A. Khayum, ACOS, assumed charge as ACOS/MYS on 4-4-55 vice Shri M. Bhasker, ACOS/MYS, taken on Sick List from 1-4-55.

4. Shri T. Natarajan, CC, COS's Office, is promoted to Class II Service and posted as Offg. ACOS/PER with effect from 1-4-55 vice Shri M. A. Khayum, temporarily transferred to Mysore.

MECHANICAL DEPARTMENT

1. Shri A. Michael, Chief Officer, is promoted as Captain 'T. S. Iswin', with effect from 9-4-55.

RETIREMENT OF SRI S. MAHALINGA SARMA HEAD CLERK, P.R.O.'s OFFICE

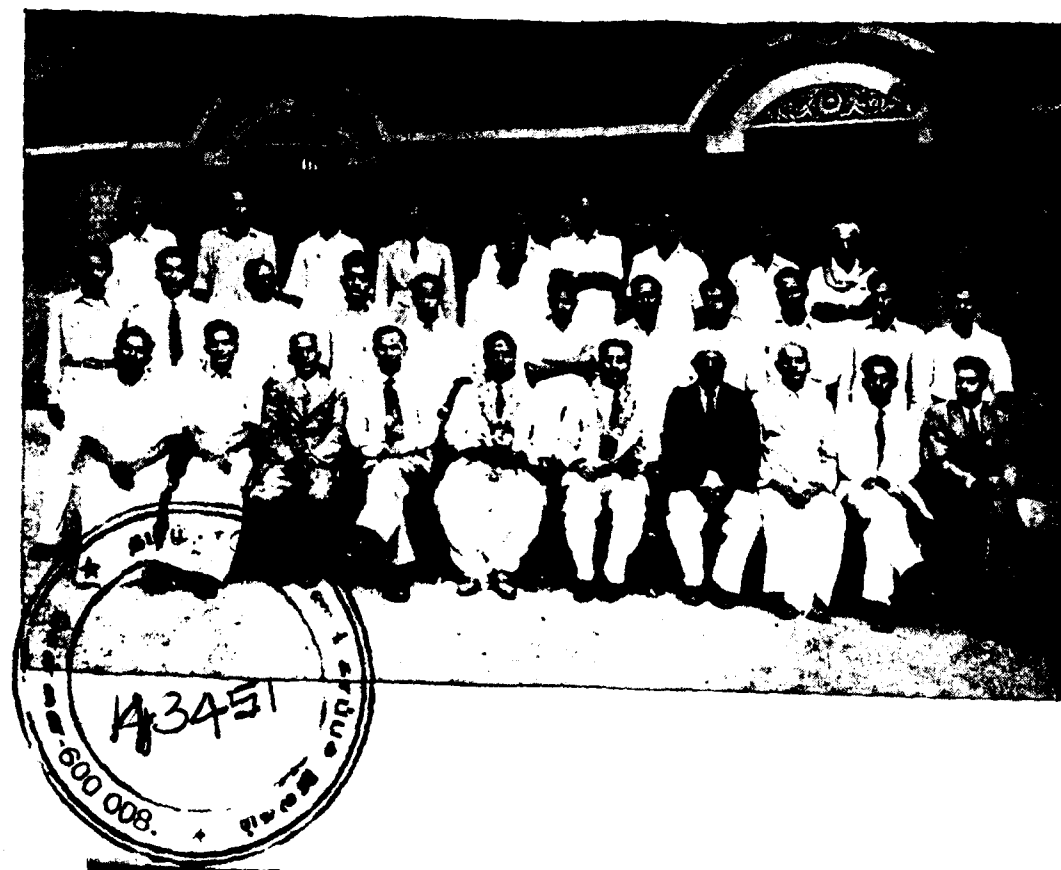
A pleasant party was got up by the staff of the P.R.O.'s Office on Saturday, 16-4-55, to bid goodbye to Sri Mahalinga Sarma, Head Clerk of the Office on the eve of his retirement.

Sri K. Srinivasan, P.R.O., who was kind enough to preside on the occasion spoke appreciating the able and efficient way in which Sri Sarma managed the office. Messrs. P. S. Vedhachalam and R. A. Ryder also spoke eulogising Sri Sarma's qualities of head and heart to which Sri Sarma suitably replied.

The function came to a close with a vote of thanks by Sri T. A. Kuruvilla.

M.N.M.

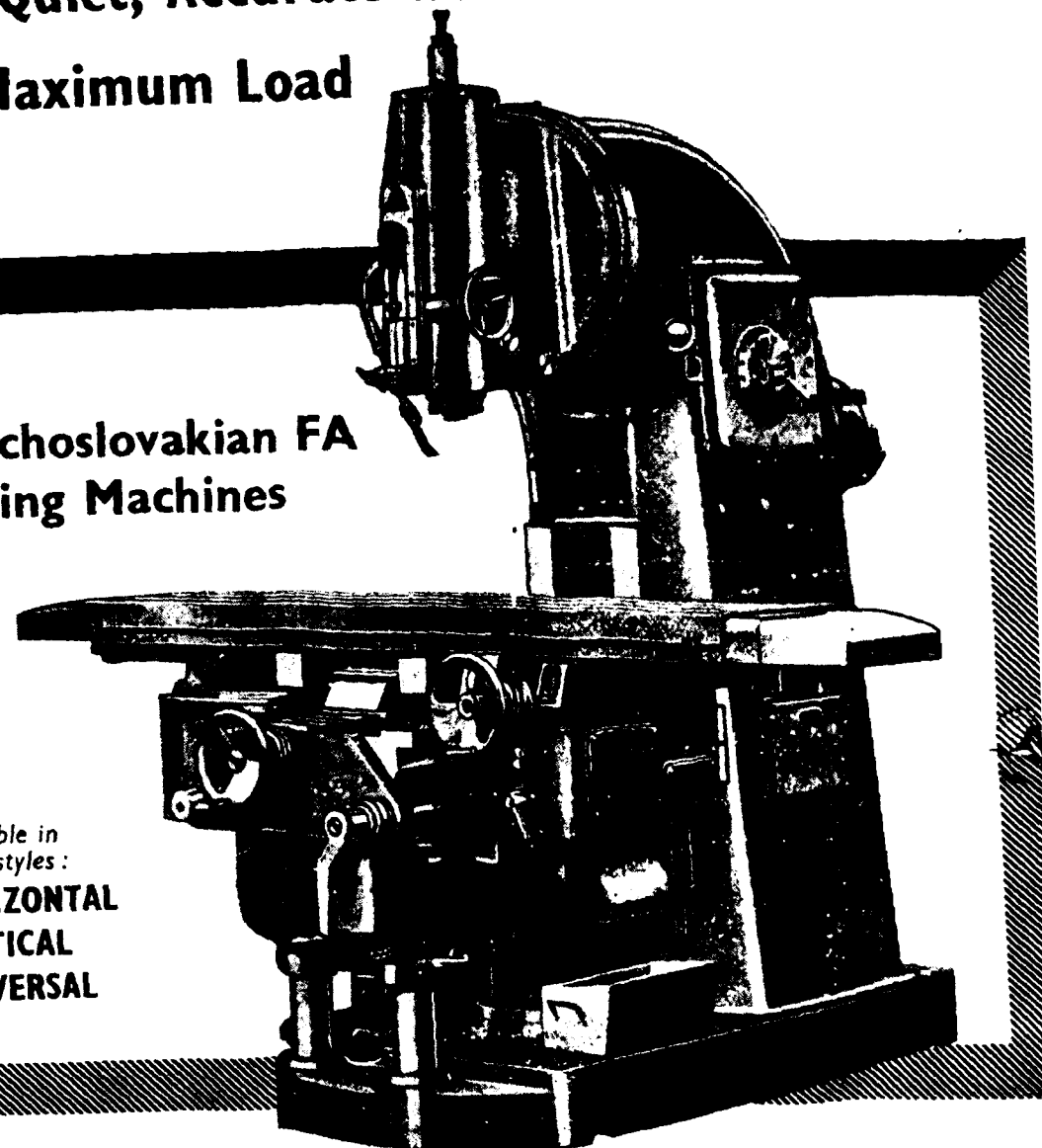
Group photo taken on the eve of Sri Sarma's retirement



**For Quiet, Accurate work
at Maximum Load**

**Czechoslovakian FA
Milling Machines**

Available in
three styles:
**HORIZONTAL
VERTICAL
UNIVERSAL**



Here are 10 Outstanding Features

- ★ Sturdy construction of column and knee
- ★ Exceptionally wide range of spindle speeds and power feeds
- ★ High-speed power rapid traverse of table in all directions
- ★ Individual spindle and feed drive
- ★ Centralised and simplified controls
- ★ Ingeniously designed milling speed calculator
- ★ Electrically controlled feed release
- ★ Accurate spindle adjustment
- ★ Effective lubrication for entire driving mechanism
- ★ Automatic lubrication and cooling of vertical screw spindle

Agents

BATLIBOI & COMPANY

Forbes Street, Fort, Bombay

OFFICES AT: MADRAS, DELHI, CALCUTTA, KANPUR, AHMEDABAD, COIMBATORE, VIJAYAWADA.

Ask Jacks about it

AGRICULTURAL MACHINERY

Tractors, Trailers, Plows, Harrows, Cultivators, Threshers,
Seed Drills, Sprayers.

CONSTRUCTION EQUIPMENT

Earth Moving, Graders, Scrapers, Cranes, Shovels, Stone Crushers,
Batching Plants, Concrete Mixers.

ELECTRICAL PLANT

Motors, Generators, Transformers, Cables, Electrode Boilers,
Welding Sets.

MACHINE TOOLS

All Types of Machine Tools, Small Tools, Measuring Instruments,
Foundry and Furnace Equipment etc.

MACHINERY AND EQUIPMENT

Oil and Sugar Mill Plant, Laundry Plant, Pumping Sets, Diesel
Engines and Mechanical Handling

HARDWARE STORES

H. S. and Alloy Steels, Metal Doors, Abrasives, Crucibles, Water
Proofing Compound, Wire Fencing, Aga cookers.

William Jacks & Co. Ltd.

National Bank of India Buildings, FIRST LINE BEACH, MADRAS.
Phone: 3226-55129 Tel.: LIMPET.

Bangalore Office:

Shaukat Buildings,

Silver Jubilee Park Road, Bangalore.



Circular Tour Concessions will enable you to plan your holidays economically and visit all important places, which are living monuments of South India's glorious past.



Tickets are also issued to tours of your own choice, approved by the Railway.

SOUTHERN RAILWAY