

# NATIONAL CUSTOMER DIALING PLANS REVEALED BY WEST COAST TELEPHONE

The West Coast Telephone Company, in common with some 530 other telephone companies in the United States and Canada, is in course of a major conversion of its equipment, its operational methods and its commercial system. This conversion was commenced some years ago. Its ultimate completion will be one of the greatest triumphs of human achievement in communication. The objective which will not be fully achieved for many years to come, is known to telephone men as "National Customer Toll Dialing."

Installation of the system calls for the closest sort of coordination between the Bell System companies and the thousands of Independent telephone companies; it will cost a staggering sum; it involves extraordinarily intricate and complex apparatus; it will greatly affect the communications habits of everyone in this county; yet very little is known about it by the general public.

"Briefly stated," said George McBride, District Manager for the West Coast Telephone Company, "when the National Toll Dialing conversion is completed any telephone user in the United States will be able to dial direct to any other telephone in the country, without the service of an operator. His call will be automatically timed and checked and recorded. The relevant information will be mechanically transcribed on the bill that will be mailed to him.

"About the only human functions left in the entire process will be those of technical supervision and maintenance of the complex apparatus that will translate his dialed impulses into completed connections and properly prepared bills."

This is no miracle-dream of the far distant future. Mechanized billing already is in use with many operating companies. A test customer toll dialing installation was put into service in Englewood, New Jersey, in 1951. In the latter part of 1953, Birmingham, Michigan and a Pittsburgh, Pennsylvania central office were also put on customer toll dialing. Most subscribers in these exchanges have been able to dial direct to 13 million telephones located in 14 major metropolitan areas — Baltimore, Boston, Chicago, Cleveland, Milwaukee, Newark, New Haven, New York, Oakland, Philadelphia, Pittsburgh, Sacramento, San Francisco and Washington, D. C.

Meanwhile, many more exchanges are already operating on

what will be, in most cases, an interim or preliminary phase before full customer toll dialing goes into effect. That is "Operating Toll Dialing" in which operators are required to complete the call initiated by the customer. They control the connection to completion, prepare the toll tickets, render assistance in giving information, handle the routing, interception, and other auxiliary services.

Among the first effects of this tremendous plan that have already affected the public is the change in telephone numbering systems. For example, a few months ago every telephone number was altered in the little exchange of Oak Harbor, Washington. Oak Harbor number 1234 suddenly became number Orchard 5-1234. This added complexity was not required for the operation of fewer than 1,000 telephones in Oak Harbor, but it was a necessary step in the business of preparing the telephone system of the United States for universal customer toll dialing. Similarly, every telephone number in the country will be changed to a number that will be an integral part of the national system. The United States is divided into 85 numbering plan areas. Washington State, for example, is in area No. 206; Oregon is in area No. 503.

"Let us assume," said Mr. McBride, "that sometime in the future when the plan is in effect here, a man in New York wishes to call our telephone office in Coos Bay, Oregon. The Coos Bay number is Congress 7-1371. The New Yorker dials the Oregon area number, followed by the local telephone number; that is, he dials 503-Co 7-3171. The 503 takes his call over any one of many alternative routes to a control switching point in Oregon say Portland. When he dials CO his call is routed to the Coos Bay Congress exchange. Then the 7-3171 selects the proper switches in the Coos Bay equipment and calls the telephone desired. Similarly someone in Everett may wish to call a certain movie studio in Los Angeles whose number is Ashley 4-3311. Los Angeles is in numbering plan area 213. So our Everett caller will dial 213-AS 4-3311. As a result, the bell at that telephone will ring as soon as he has dialed those numbers."

Every exchange name in the country, such as Bayview and Tuxedo in Everett or Congress in Coos Bay, is allotted, as a part of the National Customer Toll Dialing plan, to the exchange whose

equipment will respond to the dialing of that particular code when it becomes a working unit in the completely automatic dialing future, Mr. McBride explained. Such an exchange prefix is assigned only once in any particular code area.

The calls will be routed across the country by selective devices of extraordinary complexity that will choose the best available telephone paths. For example, when a subscriber in Everett dials a number in New York, his call will normally take the most direct route. If, however, all of the northern channels are busy, or out of order due to storm conditions or disaster of some sort, then his call might be routed a thousand miles farther south, by any one of numerous alternative routes. The selective apparatus will automatically select the best available route to the destination wherever that may be. This process of selection takes place instantaneously while the subscriber is actually dialing.

"There is one thing that automatic Customer Toll Dialing will not do," continued Mr. McBride. "It cannot select a particular person at the other end. If a person-to-person call is wanted, an operator will be necessary to complete the call and record it manually. That is why every telephone company is urging its customers to 'call by number.' Today it is faster and less expensive to call by number. A few years hence, when national toll dialing is in effect everywhere, it will be very much more so. Long distance users will find that it will pay them handsome dividends in time and money to know and record the numbers they wish to call and to call by number always.

"This tremendous plan of mechanization," concluded Mr.

McBride, will not result in less human employment. Strange as it may seem, the reverse is true. The Southern New England Telephone Company recently completed the conversion of all its exchanges in Connecticut to dial automatic operation. Yet the Southern New England Company employs 3,700 operators today, as compared with 2,100 that were employed prior to the conversion of its first exchange to dial operation in 1922. It is evident that

Brookings-Harbor Pilot 3  
THURSDAY, MAY 13, 1954

technological advances in mechanization do not destroy employment. They do create an increase in living standards and a great growth in the use of the mechanized service; this in turn creates labor requirements that more than offset the actual displacement of labor by the mechanized devices.



**SHOP and SAVE**

EVERY DAY . . . at **PALMER'S**

FIRST QUALITY

**PATRICIA NYLONS**

51-15  
or  
60-15

**77¢**

AT

**PALMER'S VARIETY**

... "WHERE YOUR DOLLAR GOES FARTHER"

## Turn your Dimes into Dollars...



Get this attractive Coin Calendar Bank ... offered as a U. S. National service at actual cost... \$1.35 with key.

Save a little each day... then at the end of the month, deposit the contents of the bank in a U. S. National savings account.

**Saving will get you anything money can buy!**

- Special vacation.
- Down payment on a home.
- Education for the children.
- Funds to meet emergencies.

*It's a wonderful feeling to know you have money in the bank!*

*The* **U.S. BROOKINGS BRANCH NATIONAL BANK**

MEMBER FEDERAL DEPOSIT INSURANCE CORPORATION

**SAVE \$ \$ \$ \$**  
**ON INSURANCE**

**For Autos and Trucks**  
Low Annual & Semi-Annual Premiums

**For Fire**

Seven Outstanding Companies, Including  
**BADGER MUTUAL OF MILWAUKEE**  
Paying 15 to 20 per cent Dividends

also  
LIABILITY - BONDS - GLASS - INLAND MARINE  
BURGLARY

**PETE J. LESMEISTER AGENCY**

The Agency of Dependable Service  
PHONE 3311 BROOKINGS, ORE