

Columbus, O.—An oriental who swung by his queue under the "big top" wore a hair tonic ad on his back.

Chicago—An electric rabbit went on strike at the opening day of a dog race meet here. Most of the crowd of 2,000 joined in the riot resulting when they did not get their money back.

"It Looked Like a Battlefield in Europe," Said Mr. C. Dunster.

"Was staying at a hotel in a small Pennsylvania town. Early one morning I went to the stable to hire a rig and was shown a pile of dead rats killed with RAT-SNAP the night before. Looked like a battlefield in Europe." Three sizes: 25c, 50, \$1.00. Sold and guaranteed by Holthouse Drug Co., Lee Hardware Co.

## REPORT OF CONDITION OF THE FIRST NATIONAL BANK

AT DECATUR, IN THE STATE OF INDIANA, AT THE CLOSE OF ITS BUSINESS ON JUNE 30, 1922

### RESOURCES

Loans and discounts, including rediscounts, acceptances of other banks, and foreign bills of exchange or drafts sold with indorsement of this bank (except those shown in b and c).....	\$662,623.60
Total Loans.....	\$662,623.60
Overdrafts, unsecured.....	424.23
U. S. Bonds deposited to secure circulation (par value) \$ 42,500.00	
All other United States Government securities.....	42,000.00
Total.....	4,100.00
Other bonds, stocks, securities, etc.....	5,250.00
Furniture and Fixtures.....	33,047.00
Lawful Reserve with Federal Bank.....	46,854.74
Cash in vault and amount due from national banks.....	
Checks on other banks in the same city or town as reporting bank (other than Item 12).....	1,417.32
Total of Items 9, 10, 11, 12 and 13.....	\$48,272.06
Redemption fund with U. S. Treasurer and due from U. S. Treasurer.....	2,125.00
Other assets, if any.....	575.33
Total.....	\$840,917.22

### LIABILITIES

Capital stock paid in.....	\$100,000.00
Surplus fund.....	20,000.00
Undivided Profits.....	\$1,025.32
Less current expenses, interest, and taxes paid.....	1,025.32
Circulating notes outstanding.....	42,500.00
Amount due to state banks, bankers, and trust companies in the United States and foreign countries (other than included in Items 21 or 22).....	45,427.76
Total of Items 21, 22, 23, 24 and 25.....	\$45,427.76
Individual deposits subject to check.....	283,404.40
Dividends unpaid.....	4,000.00
Total of demand deposits (other than bank deposits) subject to Reserve, Items 26, 27, 28, 29, 30 and 31.....	\$287,404.40
Time Deposits subject to reserve (payable after 30 days, or subject to 30 days or more notice, and postal savings):	
Certificates of deposit (other than for money borrowed).....	300,397.11
Other time deposits.....	44,073.81
Postal savings deposits.....	88.82
Total of time deposits subject to reserve, Items 32, 33, 34 and 35.....	\$344,559.74
Total.....	\$840,917.22

State of Indiana, County of Adams, ss:  
I, T. F. Graliker, cashier of the above-named bank, do solemnly swear that the above statement is true to the best of my knowledge and belief.

T. F. GRALIKER, Cashier.

Subscribed and sworn to before me, this 5th day of July, 1922.  
URCILE AMSPAUGH, Notary Public.

My commission expires April 30, 1925.

THEO. HOBROCK,  
C. A. DUGAN,  
J. W. VIZARD,  
Directors.

**Ford**  
THE UNIVERSAL CAR

**\$430**

**Buy Now-Don't Wait**

And remember—the lowest first cost, the lowest upkeep, and the highest resale value of any motor car ever built.

Let the Ford One-Ton Truck cut your hauling and delivery costs. Records of savings made by hundreds of thousands of users in practically every line of business are actually astounding. Let us show you.

You do not obligate yourself in any way.

### Equipment

Pneumatic Tires and Demountable Rims. Your choice of either the special gearing of 5 1/6 to 1 for speed delivery or the standard gearing of 7 1/4 to 1 for heavy hauling.

**SHANAHAN-CONROY**  
AUTO CO.

Authorized Ford Agents,  
Decatur, Indiana

## RADIO

### CHANGE POTENTIAL TO OBTAIN SIGNALS

#### Way in Which This May Be Done With Three-Electrode Vacuum Tube.

For every filament current there is a definite plate potential that will give the strongest signals. When using fairly hard tubes—high vacuum—bringing out taps from the individual cells of the plate of "B" battery will give variations that are fine enough.

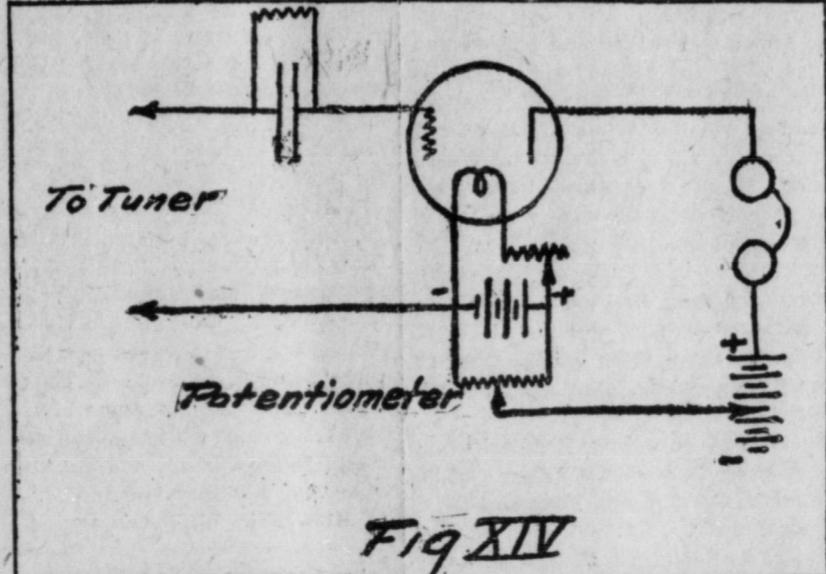
For very soft, gaseous tubes, low

current leads in connecting a socket will be disastrous to the life of the filament.

Note that the filament rheostat is set to place the maximum amount of resistance in series with the filament. After inserting the tube see that it is properly seated and that the four prongs protruding from the tube base make good contact with their respective contacts in the tube socket.

If, after listening in with a vacuum tube used as a detector with a rated filament current and plate potential, no signals are heard, go over the circuit carefully and inspect all connections, contacts, polarity of both the "A" and "B" batteries, and take a look at the grid condenser and leak.

A three-electrode vacuum tube can be substituted for the crystal as a detector in the simple radio receiving set described in this column a short time ago. Using a vacuum tube in place of a crystal detector will give a much louder signal, and a detector that when once adjusted will stay ad-



vacuum, a finer regulation of "B" battery potential is required and is most easily obtained by means of an "A" battery potentiometer. Fig. 14 shows how an "A" battery potentiometer is connected in the circuit of a three-electrode vacuum tube to give fine variations in the plate circuit potential. The resistance of an "A" battery potentiometer should be between 200 and 500 ohms. By moving the slider on the "A" battery potentiometer a variation of plate voltage equal to the "A" battery, or about six volts, can be secured. If the tube contains gas, too high a plate voltage will cause the tube to "buck-over"—that is, the gas ionized and becomes a conductor, al-

most. The material which will be required to do this is as follows:

One standard vacuum socket.  
One 6-10-ohm filament rheostat.  
One grid condenser and leak combined.

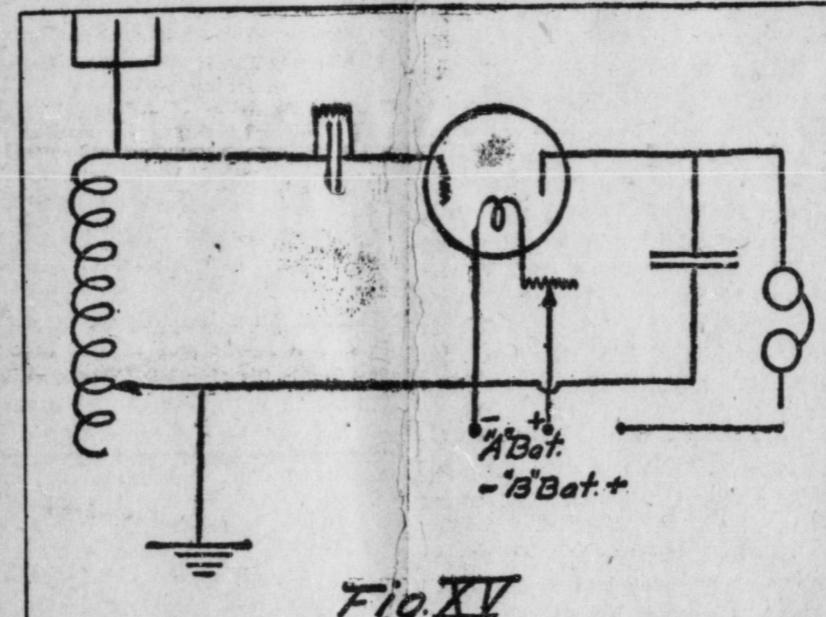
Three binding posts.

A source of filament current and a source of plate potential.

Schematically the set is connected up as shown in Fig. 15 when used with a three-electrode tube as a detector.

This set, too, can be very conveniently mounted on an 8 by 10-inch base, mounting the tube socket with the filament rheostat beside it.

In a great many of the usual receiving circuits used the so-called de-



lowing an excessive current to flow to the plate circuit which will destroy the elements.

In using a vacuum tube circuit for the first time, always check the circuit to see that "A" and "B" batteries are connected to their respective terminals on the socket. The markings on the socket are plain and cannot be mistaken. Interchanging the plate fil-

tector tube functions not only as a detector, but as an amplifier and as an oscillator, as will be explained later.

There will also be printed a table of symbols used in drawing diagrams and thus the different parts and materials used in these diagrams will be readily understood by those who are unfamiliar with these terms.

### SUN DUST IS A "RADIO NET"

London Professor Evolves Novel Theory of the Atmospheric Envelope.

Electrified dust thrown off by the sun forms an atmospheric envelope about the earth about 100 miles which prevents wireless waves from escaping into infinite space, according to Prof. J. A. Fleming, University college, London, whose work in wireless is known all over the world.

The screen made by the dust, he says, acts as a sort of wireless speaking tube and enables waves used for long-distance work—which are about ten miles in length—to travel 6,000 and 12,000 miles.

If it were not for that screen, according to the professor's theory, the wireless energy thrown out by the big sending towers would not cling to the earth, but would pass away and be lost.

### How Big Is an Electron?

One very noteworthy experiment in measuring an electron was performed by an American, Professor Millikan of Chicago. He introduced a minute drop of oil of about 1-10,000th inch in diameter in a chamber between two plates whose electrical charge was subject to control. The drop of oil was strongly illuminated and was viewed with a telescope. By controlling the potentials of the plates the oil drop could be made to fall or rise at will. The drop continually picked up and lost electrons. As it picked up an electron it would move toward the positive plate. By carefully observing the action of the drop of oil, Millikan was able to determine very accurately the charge added to it by its picking up one electron.

### TIPS FOR FANS

A meeting of representatives of stations within 300 meters of New York and New Jersey was called to prevent radio "jam" in the air. Some of the sweet things that come through must have gummed up the ether.

For use across the secondary of a tuner, such as the honeycomb coils, use a condenser of twenty-three plates or less. The less capacity used in the secondary circuit, the better will the set work.

If, after wiring up a set, you hear nothing but a steady hum in the receivers, you may be very sure that there is an open circuit somewhere. Trace out the wiring carefully and some little fault will present itself.

The so-called "spaghetti" tubing, if placed over bare wire used in wiring a set, will improve the appearance 100 per cent and reduce the danger of short-circuits.

More and more are the radio fans turning to radio-frequency amplification instead of audio-frequency. The chief reason for this lies in the fact that in radio-frequency amplification the incoming signals are amplified before they reach the detector, where they are rectified, while in audio-frequency they are amplified after reaching the detector. In the first method signals that are very weak are brought in, whereas in the latter method they would probably not be heard.

FOUR YOUNG PEOPLE FIGURED IN AN AUTO ACCIDENT SUNDAY NIGHT

Four young people had a remarkable escape in an automobile accident which occurred Sunday evening at a point one-half mile south of the town of Uniondale, in which a Ford touring car turned turtle.

The occupants of the machine were Elta Heller and Walter LaFavor, two Geneva young men, Miss Dorothy Odier, a daughter of William Odier. The two girls live in the vicinity of Uniondale.

Miss Odier received a wrenched back and an injury to one thumb, and it was feared at first she was dangerously hurt, as she was pinned under the steering wheel, and was held firmly until the machine was lifted. She was able to be up and around today, and it was thought the injury to the back would not develop into anything serious.

The other three also were caught under the machine, but escaped with slight scratches and bruises. Other motorists were quickly on the scene and gave assistance to the party in the wreck.

The automobile was badly wrecked and had to be towed to a garage for repairs, and Heller telephoned to a brother at Geneva to come after him and his companion in another car.

The machine was reported traveling at a pretty good speed when it was deflected by dropping over the edge of a culvert, ran along in the side ditch for some distance and then flipped over.

SCHOOL MARMS WANT TO "ROBERT" THEIR LOCKS AT COLUMBUS

Columbus, July 5.—Half a dozen young and pretty school marms here want to bob their hair.

They're going to petition Donald DuShane, superintendent of schools, for permission to do so.

The teachers won't ask it in just that way. They will call it "Robert" instead of "Bob". They're highly proper.

"One might as well be dead as be out of style," one of them said.

New York—Police woke a negro spiritualist from his dreams when he told them to search tires of an automobile for money stolen from a bank.

## DEMOCRAT WANT ADS GET RESULTS

## REDUCED FARES

Obtainable by Purchasing a Coupon Book

**\$5.00 Value For \$4.15**

Good for One Year.

Good for Bearer or Bearer and Party.

Ask agent or conductor for full information.

Also Low Commutation Rates

Ft. Wayne & Decatur Traction Company

## The Uses of a Bank

The Uses of a Bank are more than most people imagine. With its facilities, its acquaintance, its connections and its organization, this bank is enabled to be of use to its patrons in many ways. Come in and let us help you with your financial problems.

## The Peoples Loan & Trust Co.

BANK OF SERVICE

**\$15<sup>00</sup> down**

Installs a

**RUUD 95**

pay for it as  
you use it,

HERE are two things that give you a real opportunity to get Ruud Automatic Hot Water Service:

**No. 1** The latest development in water heaters is the Ruud 95. It is built especially for small homes like yours. There is no difference between it and the larger Ruuds of which you know. Quality is the same; it is now merely made in a smaller size to meet small home requirements and to fit the small home pocketbook.

**No. 2** It's easy to buy the Ruud 95. \$15 down installs it in your home at once. Pay the balance monthly and enjoy Ruud Perfect Service as you pay for it.

Make sure of Hot Water Comfort today. Set aside ten minutes to see the Ruud at work. You will see just why its automatic operation frees you from hot water troubles and why it is impossible for you to ever run out of hot water.

Tomorrow is a good day. Today is better. We want you to know the whole story. Write, phone or call.

Northern Indiana Gas  
and Electric Co.

"The Gas Co."

FOR  
yours and every  
small home

**RUUD 95**  
Automatic Water Heater  
FOR THE SMALL HOME