9:30 p. m.

### BUSINESS AND PROFESSIONAL

One cent the word each time.

#### PHYSICIANS.

DR. ERNEST A. WOODS-Practice limited to eye, ear, nose and throat. Office hours, 10 to 12 and 2 to 5. Swedenburg Bldg., Ash land, Ore

DR. J. J. EMMENS-Physician and Surgeon. Practice limited to eye, ear, nose and throat. Glasse supplied. Oculist and aurist for S. P. R. R. Offices, M. F. and H. Bldg., Medford, Ore. Phone 78'

DR. MATTIE B. SHAW-Residence and office, 108 Pioneer avenue. Telephone 28. Office house, 10 to 12 a. m.; 2 to 5 p. m., only.

DR. H. M. SHAW-Physician and Surgeon. Special attention Eyes, Ears, Nose, Throat. Glasses fitted. Room 6, Mills-McCall Block. Phone 79 or 28.

DR. G. C. PHETTEPLACE—Dentist -successor to W. E. Buchanan. Special attention given to straightening and care of children's teeth. Office hours, 9 to 12 and 1:30 to Office phone 151. Residence phone 201-J. Camps Buliding, Ashland, Oregon. 45tf

#### CHIROPRACTORS.

Bank Bldg. Phone 48-142. House Calls

#### VETERINARY

DR. J. P. CHISHOLM-Graduate veterinary. Located on the Gill property, west of the Normal School on Walker Ave.

#### CONVALESCENT HOME

CONVALESCENT HOME - Good 61 North Main. cheer. Good care. Good food. Terms reasonable. 153 Granite St. Phone 411-R. 306-1mo

#### TRANSFER AND EXPRESS.

FOR prompt and careful service rick's. We sell for less. auto trucks or horse drays, call Whittle Transfer Co. Phone 117 Dunsmuir Auto Stolen-Office, 89 Oak street near Hote Ashland.

trucks. Good service at a reason able price. Phone 83.

#### FOR EXCHANGE

FOR TRADE-160 acre unincumbered ranch on Pacific highway and county road, near Hilt; small fy of wood and tillable land. Will Established 1883. trade for unincumbered Ashland acreage: prefer no house, but would ensider acreage with smal! house. Eleanor Greer, 199 Gran. Bread. ite St. 231tf\*

#### LOST.

LOST-Gold wrist watch Reward for return. Zora McCourry, 468 Dak

LOST-Large orange Persian cat. Finder notify Mrs. C. W. Sorenron, 466 Allison. Phone 327-L.

### FOR SALE.

SWEET CIDER-Made fresh every 40c, delivered. Phone 9-F-11.

FOR SALE-Winter apples. Phone 10F13.

FOR SALE-Winter apples at \$1 per Moore. Belleview.

FOR SALE-Two milk goats.

tables. New spray pump; also panied the boys. furniture. R. 1, Box 93. 70-3\*

FOR SALE-Dry laurel wood, plenty \$4.50; also 12 inch body fir, \$3.75; Free bus. 12 inch second growth fir, \$3.25; delivered. 1224 Iowa St. 68-mo\*

fruit, garage, nice location. Low price for cash or will sell on terms. See Mrs. C. E. Lane, Tidings, 68-6

FOR SALE-Wicker baby carriage, in good condition. Inquire Mrs.

horn hens, at 50 cents tach.

## **Good Insurance**

We have not gone out of business! This Agency was established in 1883 and has been built up with the idea of protecting the people of Ashland and vicinity with SOUND INSURANCE. We do not deal in CHEAP INSUR-ANCE; if we considered it safe for the assured, we would bave had it to sell at this office years ago. The agent of cheap insurance gets all his stuff is worth. No one can afford to lose even once on fire insurance.

## **Billings Agency**

Established 1883

Phone 211

Real Estate and Real Insurance ASHLAND, OREGON

41 E Main St.

#### HELP WANTED

Reference required. Write Mrs. L. A. Salade Jr., Central Point.

FOR RENT.

J evenings or Sunday.

FOR RENT-Two room apartment furnished. Adults only. 133 No. Pioneer street.

FOR RENT-Furnished housekeeping apartment, close in. 573 E

FOR RENT-Small house, nicely furnished, one block from First Natl. Bank. Adults preferred. Phone 122. Inquire 357 Vista St. Bread.

#### LOCAL AND PERSONAL

Bootlegger Is Jailed-DR. E. B. ANGELL-Chiropractic Medford is getting to be an expendere. For citron, orange and lemon and Electro-Therapy. The combi- sive business. T. R. Spencer was peel, raisins, currants, figs, spices, nation does wonders. First Nat'l fined \$250 and given 30 days in the sugar, etc., Detrick's Groceteria sells county jail by Justice Glenn O. for less, Taylor. Spencer was found near a side entrance of a hotel with a quantity in his possession and had just made a sale.

New walnuts No. 1, three pounds

If you want the best there is in Kozer, secretary of state, bacon, boiled hams, chipped beef, lard and shortening, get it at Det-

While its owner was attending an orchestra rehearsal, a Ford automo-T. L. POWELL-GENERAL TRANS bile belonging to E. M. Akers, of ments. Dr. Geo. J. Kinz, Chiro-FER - Good team and motor Dunsmuir, was stolen Thursday evening. Officers were notified and an effort is being made to recover the machine. It is believed that the thieves went north.

house and outbuildings; good price. For sound insurance at reastock or chicken ranch with plen-sonable rates, see Billings Agency. Phoenix. A large number of sports- the magnetic field in the same direct ductors in two successive layers are relieve kidney and bladder trouble.

Ask your grocer for Golden Sheaf

#### Returns to Dunsmuir-

Mrs. Charles Smith, who has been visiting friends in the city for a 74-4\* short time, has returned to her home Beaver Realty Co. about your insur in Dunsmuir.

You lose if you fail to buy one of Enders special hams.

Piano Tuning-135 East Main. Phone 465.

### 52-1mo\* Central Point Boys Hike-

box. Bring your boxes. W. L. the post office in that town early ing the evening, while Superinten-63-6 this morning for a long hike through dent A. G. Smith, of Medford, made Ad- the hills. Each boy took his lunch, an address on the subject, "The Boy dress R. 1, Box 32, Talent, Ore. meat and a frying pan. The expe- and the School." A play hour was 69-4\* dition was in charge of the county held following the banquet. FOR SALE-Canner, commercial Y. M. C. A., and adult leaders from size—save your fruit and vege- Central Point and Medford accom-

Dance Jackson Hot Springs, Satur- Warner's corner. of heater chunks; 12 inch tier, day night. Good music, good floor.

Buy your Xmas aprons and hand-FOR SALE-Four room cottage, city kerchiefs, Masonic hall, Saturday, water and lights large lot, some December 2, afternoon and evening.

### Pierce Expense Large-

In his own behalf as candidate for O. R. Kluth, 78 Sixth St. 70-3\* the governorship of the state, Walter M. Pierce, of La Grande, spent! FOR SALE—Tancred White Leg- \$1065.70 in gaining the position, ac- not in the banking business. Paul- fastening. The end of the wire may 11-3\* cording to his campaign statement sernd's. filed with the secretary of state.

> Ask your grocer for Golden Sheaf 52tf

Cliff Payne makes fire screens.

Beaver Bldg.

### Marine Corps Wants Men-

Due to the present shortage of field musicians in the Marine corps. being staged throughout the coun-cember 2, afternoon and evening. try. Young men between the ages of 17 and 18 are wanted to go to the musician's schools at Paris Island Leaves for Southand Mare Island. The minimum height for enlistment is 64 inches.

Christmas only a few days away, the winter. Order that new suit now, at Orres and get 100 per cent satisfaction.

and Dyeing Works. Phone 63. 67tf Box 455 Dansmuir Calif 69

Another Soldier Missing-

Relatives have requested the American Legion to assist in finding the whereabouts of Fred Henniford Goodwin, of 546 East Market street, Indianapolis, who disap-WANTED-Girl to do cooking and peared October 28. He is 31 years downstairs work. Good wages. old and weighs 145 pounds. His hair is light brown and eyes are 67-6 | blue. He is five feet nine inches tall. When he left home he wore an army shirt and trousers, a faded blue FOR RENT-Nicely furnished five serge coat and a faded green cap. room apartment. Light and wa- Goodwin served 18 months with the ter furnished. Inquire R. W. Con- 150th field artillery of the Rainbow 65tf division. Relatives fear he has suffered a mental lapse.

> LEEDOM'S Tire Hospital will REPAIR your TIRES the RIGHT WAY and give YOU a POSITIVE 11-3 GUARANTEE of SERVICE or your MONEY REFUNDED.

> > Ask your grocer for Golden Sheaf

Registered in Portland-

Mr. and Mrs. F. F. Whittle, of Ashland are among the out of town visitors .- Portland Journal.

Peddling moonshine "likker" in Fruit cake and mince meat time is 48tf

See Paulserud's \$30 special suit.

#### Alice E. Hanley Files-

Alice E. Hanley, of Medford, spent for \$1; Brazil nuts 23 cents pound, \$42.25 seeking to be representative five pounds for \$1. Plaza Market, from the eighth district on the Inde-64. pendent ticket, according to campaign expenditures filed with Sam

> Don't buy a turkey. Eat your Thanksgiving dinner at the Plaza Confectionery. Make reservations

Phone 401 for residence appoint-

#### Turkey Shoot Sunday-

Local and Rogue river valley rifle and shotgun experts will be given an opportunity to bring home, not the bacon, but the turkey Sunday when Cheap insurance is costly at any a big turkey shoot will be held on the Lamport place one mile north of 1 represents the tuning coil—all of In a "duo-lateral" winding the conmen from southern Oregon are ex- tion. Fig. 2 represents approximate- not parallel as they are in the bank Sold everywhere.

> Crown Best Patent Flour, \$8.75 forms. When the two coils of Fig. 2 wound variometers with no shunted per barrel until Thanksgiving. Plaza Market, 61 North Main.

Better be safe than sorry. See ance. Phone 68.

Orres cleans clothes. Phone 64

### Banquet at Talent-

The second annual Father and Son Now is the time to have your plano banquet was given in Talent Friday day. Two gallons 75c, one gallon tuned. Carl H. Loveland. Studio, evening by the Sequoias, the junior 66tf v. M. C. A. club of Talent. Practically every man and boy in the dis- doors. trict attended the dinner. Several Boys of Central Point started from Ashland men made short talks dur-

> Dance Jackson Hot Springs Saturday night. Free transportation for power or telephone poles. ladies from taxi 58, Ninninger & 70-3 the electric light circuit.

Have your clothes pressed on a Hoffman press at Orres Tailor Shop.

### At Work Near Talent -

Mr. Aiking and Mr. Kelly, of the of your own apparatus. local telephone company, were doing some repair work Friday on the lines of the company near Talent: for connections in the rear of panels, it will break when bent or it is most

We'll help you save—though we're 67tf | be annealed by heating it in a flan-

A live charge in your magneto at solder. The wire can then be bent 70tf several times, without its breaking. the Fixit Shop.

### Here from Portland-

Mr. and Mrs. F. L. Fry, of Portland, arrived in the city Friday for ing a large horseshoe magnet in a Good reliable dentistry at reasen- a short visit with relatives and certain position so that the poles of able prices. Dr. Henry B. Purl, friends. They were accompanied by the magnet are on each side of the Mrs. Dr. Poulson, who is stopping tube. This probably is due to the magfor a few days with Mr. and Mrs. netic effect upon the moving electrons Howard Rose.

O. E. S. Apron and Handkerchief an active campaign for enlistment is Bazaar, Masonic Hall. Saturday, De-71-tf If the aerial is shorter, use two wires.

Mrs. A. C. McCarthy, of North Main street, left this week for the wires from the far end. south, where she expects to spend

ber of available wave lengths for Man leaving for Seattle and points broadcasting by varying some of the en route about December 12, in com- many 360 meter stations by 25 or more There is still time to have that suit fortable 7 passenger car, will take meters. cleaned before Thanksgiving. Ladies' up to 7 passengers to help share exwork a specialty. Ashland Cleaning penses. Write for reservations now.



# **VARYING INDUCTANCE**

## Affect Reception of Long and Short Waves.

of forms. For short waves, the most | ical surface and having a small megle layer of wire wound upon a so-called "basket" winding. Not

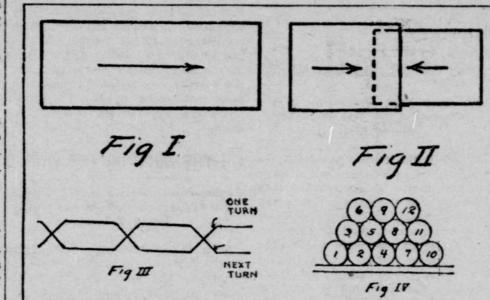
which gives single turn variations or the distributed capacity is reduced a switch which usually varies the in- to a minimum. This is accomplished ductance in groups of turns. For by separating adjacent turns and very close tuning where even the crossing them at right angles.

be procured by splitting the number complished by the use of a series of

down the coil and the total inductance is decreased. Finally when the winding on the inner cylinder is exactly under the winding on the outer cylinder, the inductance of one coil neutralizes that of the other and the resultant inductance, neglecting leakage,

A variometer functions exactly as OF THE TUNING COIL did the two coils shown in Fig. 4. In a variometer, one coll rotates with nespect to the other instead of sliding in and out as was the case in How Different Forms of Winding Fig. 2. It the windings of a variometer are on a cylindrical surface there will be a large amount of leakage, which decreases the ratio of maximum to minimum wave length Tuning inductances for radio re to which the variometer will tune. A ceiving circuits are made in a variety variometer with windings on a sphercommonly used form of inductance is chanical clearance between rotor and the single layer solenoid, which is stator will give mimimum leakage. nothing more nor less than the com- There is an excellent variometer on mon tuning coil, consisting of a sin- the market at the present time with a only are the windings on a spherical The method used to vary the in- surface, but a cross-section of the ductance of a tuning coil is a slide winding (see Fig. 3) is such that

turn to turn variation is too coarse, a This same method of winding inducseries or shunt in the circuit is nec- tances is applied to the "spider web" coils. The change in wave length A closer variation of inductance can when using "spider web" colls is ac-



of turns in two and winding one-half ; shunt variable condensers since the on a hollow cylindrical tube, and wind- coils are not as a rule provided with ing the second half on a slightly small- taps. er cylindrical tube of such size that it can easily be slid into the first | wound coil is used to reduce the dis-Fig. 1, but wound on two concentric angle. In our estimation basket

are separated the fields of the two capacity are most efficient for short coils do not react and the inductance | wave tuning while duo-lateral wound is the sum of the separate inductances | coils of large diameter, with a small of the two individual coils.

As the coils are brought closer to- ing, are most efficient for long wave gether the field of one coil bucks reception.

Don't listen-in during a thunder-

Don't cause interference with other

Don't try to use a loud speaker with

Don't run wires parallel in making

Don't neglect to read everything

Don't attach ends of antenna to

Don't connect a radio set direct to

Don't forget that tickler coils are

Don't expect to get loud signals with

a crystal detector set while using an

Don't always blame the broadcast-

ing station. It is sometimes the fault

Annealing Hard Wire.

sure to break upon removal from the

nel or by applying a coat of tin or

Help Tube With Magnet.

sometimes may be increased by plac-

that flow across from the filament to

Length of Aerial Wires.

one at least 75 feet long can be put up.

taking the leading-in wire from the far

end. If the aerial is to be only 50 feet

or less over all, make it a four-wire

one, and again take the leading-in

Will Stop Jamming.

It is proposed to increase the num-

A single wire aerial is sufficient, if

The sensitivity of an audion tube

If hard-drawn copper wire is used

not used with crystal detector sets.

a crystal set.

up receiving sets.

available on radio.

indoor antenna.

the plate.

amount of shunted capacity for tun-

RADIO SPARKS Every One of Them Is Valuable Advice to the Amateur Radio Mr. Edison is credited with Operator. the discovery that a current existed between a lighted filament Don't fail to insulate the antenna. and a plate inclosed in a vacu-Don't place the lightning switch inum tube, the great principle involved in the successful ampli-

USEFUL "DON'TS" TO KNOW | >-----

prevented by the unfortunate failing of his hearing. Chilo, a champanzee in the Milwaukee zoo, has a radio set

fiers. More recent work by him

in radio development has been

especially built for him, The United States forest service is receiving valuable assistance from radio in fighting forest fires. Through broadcasting information regarding the location of fires much valuable time

Eight broadcasting stations, costing a total of \$1,000,000, will soon be built in Great Britain. The fans will be charged a "listener's fee" of approximately \$2.50 a set in order to support the stations, which will be op-

erated by the government. One of the best-known radio "dead spots" is in the Red sea. Ships passing through this region can read no signals from the Aden station, but on leaving it, messages are picked up at full

From the west comes a story of a method to use the telephone overhead wires for radio antenna. This cannot be done, however, with a grounded return circuit such as is found in farm-

Isn't it a helpless feeling when you have just a receiving friends giving you a pan over the air phones, and you sit and listen and listen, then listen some more, and you can't do a thing but keep on listening?

The large corporations find It profitable to provide entertainment by means of radio for their employees in isolated places. This may be the solution of keeping the hired girl on the job in the country.

Y. M. C. A. boys camping in Montana found enough specimens of galena near their campsite to equip several radio sets. Warnings are again prevalent throughout the country regarding sellers of worthless radio

LITTLE TALKS ON THRIFT

By S. W. STRAUS, President

American Society for Thrift. IT IS gratifying to note that the

the greatest era of home-building and homeownership in the history of our country. This is important because these activities signify widespread practices of thrift. Thebuildingof homes means the creation of new wealth. coming either directly or in-

directly from

S. W. STRAUS

the savings of the people. Statisticians tell us that during the year 1922 more than one billion dollars will have been utilized in the erection of homes for our people, a considerable portion of which represents new home-owner ship. It is a splendid commentary on the rightful tendencies in American life. It shows right thinking

and right living. In 1920 there were 11,400,000 home owners in the United States, and this number has been greatly increased during the intervening two years. It would probably be safe to estimate that there are 13,-000,000 home-owners in the United States today.

A nation which spends more than a billion dollars a year for new homes and which numbers 13,000,000 home-owners among its population, offers scant comfort for the alarmist, the Bolshevist or the pessimist.

In many ways we, as a people, are unmindful of the values that come from thrift, but the fundamentals are sound and no better proof of this can be found than in the extent of home-ownership in America and the rapid development of this phase of our national

Recovers from Rheumatism "Had rheumatism five months that would go from my left knee to my For longer wave lengths the bank back. Finally used Foley Kidney one. If now, the two coils are con- tributed capacity in winding multi- Pills and in 15 days was entirely nected in series but in such a man- layer inductances. Fig. 4 shows how cured," writes W. J. Oliver, Vidalia, ner that their magnetic fields inter-lock, a continuous variation of in-lock, a continuous variation of in-lock, a continuous variation of indull headaches, dizziness and blurred ductance can be had by moving the "duo-lateral" coil is an im- vision are symptoms of kidney discoils with respect to each other. Fig. provement over the bank wound coil. order. Foley Kidney Pills quickly

Scotland's Many Islands.

LV. MEDFORD LV. ASHLAND 7:00 a. m. 7:00 a. m. 8:00 a. m. 8:00 a. m. 9:00 a. m. 9:00 a. m. 10:00 a. m. 10:00 a. m. current year has proved to be 11:00 a. m. 11:00 a. m. 12:00 noon 12:00 noon 1:00 p. m. 1:00 p. m. 2:00 p. m. 2:00 p. m. 3:00 p. m. 3:00 p. m. 4:00 p. m. 4:00 p. m. 5:00 p. m. 5:00 p. m. 6:00 p. m. 6:00 p. m. 7;00 p. m. 7:00 p. m. 8:30 p. m. Sat, only 8:30 p. m.

9:30 p. m.

16:30 p. m. Sat. only 10:30 p. m. Sunday Schedule Leave Medford for Ashland and Ashland for Medford every hour on the hour from 9 a. m. to 5 p. m.; then 6:30 p. m. and 9:30 p. m. Ashland waiting room-East Side Pharmacy.

INTERURBAN AUTOCAR CO.

(Effective January 1, 1922)

Daily (Except Sunday)

ASHLAND-ROSEBURG STAGE

Daily (Except Sunday) LV. ASHLAND LV. ROSEBURG

1:00 p. m. 1:00 p. m. Travel by stage; shortest route by 20 miles; one of Oregon's most scenic trips. Fare-Ashland-Roseburg, \$4.60; Medford - Roseburg. \$4.15; Grants Pass-Roseburg, \$3.00. MEDFORD-GRANTS PASS

Daily (Except Sunday) LV. MEDFORD LV. G'T'S PASS 10:00 a. m. 7:30 a m. 2:00 p. m. 1:00 p. m. 5:00 p. m. 5:00 p. m.

Sunday Only 10:00 a. m. 4:30 p. m. 4:30 p. m. Grants Pass waiting room-The Bonbonniere, phone 160.

Office and waiting room--No. 5 Fluff Rugs, made from your old worn out carpets. Telephone 208. 41-eod-1mo\*

Investigate our Ideal

Our New Line of Heating Stoves Are Now In. Provost Bros.

HOT WATER HEATING SYSTEM

For Small or Large Houses



#### Safety blades resharpened like new. Single bit, 30c

## **Profits Start at Once**

There are no lost dividends when you put your surplus funds in our Certificates of Deposit. Interest starts the day you deposit your money.

These Certificates may be obtained in large or small denominations, and are protected by the entire resources of this institution.

## The Citizens Bank of Ashland Ashland, Oregon

## In Stock

# Duplicating Sales Books

WITH CARBON

Per Dozen ......\$1.25 Two Dozen ......\$2.25 One Hundred ......\$8.00

**ASHLAND TIDINGS** 

The islands of Scotland number about 800 altogether.



doz. Dobule bit, 60c doz Children's Work A Specialty