# News of the Week Cut Down for Busy Readers

### Sporting

Bernie Leonard and Lew Tendler put up a hot twelve-round bout at Jersey City, Leonard winning by a shade.

### Personal

Frank S. Coonglit, for six years governor of Sartilet, Frazier & Co., grain brokers at Chicago, dropped dead from heart disease while chatting with friends on a veranda of the Blackie Country club at Aurora.

• • •

Maritime Reynolds Carter and John G. Pritchard were married in the home of Mr. and Mrs. Douglas Fairbanks in Los Angeles.

• • •

Dr. Frank B. Wynn of Indianapolis, nationally noted as leader in tuberculosis prevention in the United States, was killed in a fall from a cliff at Glacier park, Mont.

### Washington

More than a million tons of coal will be on the way to the United States from England and Wales by September 1, the shipping board announced at Washington.

• • •

Reforms, given out at Washington on coal output in the seventeenth week of the strike, July 24-29, give the first hint of the response to the invitation for peace moves. There has been a slight recovery.

• • •

Peace in the railroad strike within a few days was virtually assured at Washington, announcement from the White House at Washington, that President Harding will submit a peace proposal to congress.

• • •

Henry Spencer was appointed federal judge at Washington by President Harding.

### Domestic

Lieut. Tracey Lyons, aviation section U. S. A., and Augusta Altemeier, Jr., of Fort Sill, were married by Chaplain Earl Jervis when an airplane in which they were riding crashed to the ground.

• • •

A six acre peach orchard in Montana Turkey red winter wheat threshed 60 bushels per acre, and yielded forty bushels to the acre, key reported to G. M. Gooding, governor.

• • •

Fifteen cents a pound for boarding and other sections of Atlantic City, is the latest notice to living upwelling of prohibition agents. Experts value the at $10,000,000 annually.

• • •

Pretty Mrs. Gertrude S. Kirkland shot and killed her husband, Percy, the Chicago police charge, after he is said to have beaten her for trying to leave him.

• • •

All world bowling records have been broken by pinsetters on the Inter Monarchy, which left Chesterfield for New York, Numbering 500 they drank 100,000 bottles of beer during the seven days between ports.

• • •

The federal government has no objection to the action of mines by the governors of individual states in the issuance of licenses, it was stated officially at the White House at Washington.

• • •

A northeast ice theory Poole, negro murderer, who killed Floyd Hawkins, a white boy, to death, could not be found in the county jail at Fort Pulaski, Georgia, when a mob visited the jail.

• • •

Harry Daugherty died at Red Bluff, Cal., as a result of being hit by a rock thrown by a fellow fugitive from fire his scrap in two plants during the war.

• • •

More than 300 men and women were arrested as the result of raids on soft drink places in Chicago, suspected of violating the liquor laws.

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A Portland (Ore.) dispatch says Japanese fishermen off the Pacific and Atlantic ports have their number where bombing operations are not allowed. Fear of a railroad embargo has held up supplies to the bloody ship lines.

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Federal agents at Louisville, Ky., say 6 of John Rodes, a former Bryan, Ky., gunman, probably fatally wounded at another shooting affray. They have organized a band to run fight at a distillery a short distance from the Rodes business place.

• • •

The first really warm weather broke into Boston's northern home at noon. Worst sufferers were those who died after having been killed by a heat wave.

• • •

Five hundred cars the side in the Boise basin of Idaho, S. D., and Oregon, to the Pacific coast and canyon to navigation.

• • •

Thousands of railway operating freighters would be employed on the Great Lakes, according to a statement issued by Mrs. Aaron Cleary, widowed the Great Lakes, S. M. of the Port Huron, Mich., Times-Herald.

• • •

Three persons were burned to death and several hurt when a gasoline operating machine, used in distilling, exploded at Bayonne, N. J.

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The ships of the Atlantic fleet will anchor at Newport from August 7 to August 30, it was announced at the naval Charleston (Mass.) navy yard.

• • •

Twenty thousand street car and elevated railway trainmen went on strike in Chicago at 4 o'clock Tuesday morning.

• • •

William Trope, West Manchester, O., was killed by lightning during an electrical storm which swept Wayne county.

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Fares on all city street car lines will be 5 cents, instead of 6, Cleveland city council unanimously passed a measure for all transfers will continue in effect.

• • •

A high wind crossed several thousand dollars' damage in the Fox river valley at Appleton, Wis., was uprooted, several barns blown down and a large number of trees uprooted.

• • •

Two tornadoes within an hour struck in the vicinity of Cuthrie, Floyd county, Ga., destroying buildings on one farm, uprooting houses on others, and blowing cars flat over a wide area. No one was injured.

• • •

Damage estimated at $125,000 was caused near Abilene, Tex., when lightning struck a tank belonging to the Texas Pipe Line company. Fifty-five thousand barrels of crude oil were destroyed.

• • •

Control of all wheat raised in the provinces of Alberta and Saskatchewan will be vested in the hands of the governments of these provinces, says a Winnipeg dispatch.

• • •

The Canadian government, said Charles Stewart, minister of the interior at Winnipeg, is building a detour road to relieve the Crow's Nest pass, which is the present outlet to the coast of the state board of controlled lots and settlement.

• • •

Smashing up of 4,500 cities seized by United States prohibition agents in Chicago and suburbs in the last few months was begun by United States Marshal Robert J. Levy.

• • •

Ernest H. Bliss, assistant district forecaster for the weather bureau at Chicago, was appointed official observer reporting the weather bureau reports for Lake of Heather Springs, Mich.

• • •

Baron Julius Herzog de Rothschild, son of the multi-millionaire Paris banker, Baron Henri de Rothschild, was sued at New York for $500,000 damages for alleged breach of promise of marriage.

• • •

Brig. Gen. Henry J. Reilly of Chicago, who was colonel of the 6th Illinois and Forty-ninth field artillery of the Rainbow division, has been made a commander of the Legion of Honor by the French government.

### Foreign

Princess Henry Loog of Lowenstein-Wertheim-Freudenberg, and Prince Ludwig Ferdinand Eugene of Bavaria, born, N. C., were killed at Erkenfeldstein, Germany, when their machine ran into a tree.

• • •

Berlin announces that France has rejected Germany's request for a respite on the monthly payments on the debts contracted by German nationals with allied citizens prior to the World war.

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The Greek foreign minister has given the Italian minister to Athens a note declaring that Greece will not attempt to occupy Constantinople without the consent. This announcement was made in the house of commons at London.

• • •

A Bern, Switzerland, dispatch says that by a sheer drop of 3,000 feet into the Lauterbrunnen valley, a number of cattle were killed when climbing the Jungfrau.

• • •

The Bulgarian government at Sofia declared that the persecution of the religious communities in Bulgaria, which began in 1921, has ceased for all time.

• • •

A cancer dispatch says hourly improvements for the cure of cancer have been announced and rapid progress is being made by the national cancer institute in the war on Chancroid, a cancer on Chen Ching Meng's knee at Shinkow.

• • •

The United States has recognized the governments of Latvia, Esthonia, Lithuania and Albania, Secretary Hughes announced at Washington.

• • •

Berlin, June 29.—Two guard-sold son of the American consular agent at Sagan, Germany, were fined 50 marks each by a Berlin court for $20,000 ransom, according to dispatches from the "First Lady of the Land," Mrs. Warren G. Harding—and from another Mary Pickford or Mary Garden or Geraldine Farrar or Mary Roberts Rinehart or Ida M. Tarbell or Edith Wharton.

Again, one might serve Mrs. O. H. P. Belmont or Alice Paul of the National Woman's party or Mrs. Maud Wood Park of the National League of Women Voters; it depends upon whether one is or is not militant in the matter of women suffrage.

Again, if the list is to be made up of women who have won distinction in their respective fields of endeavor there is the difficulty that some of the names are not widely known. Such a list would be scorned by people who think only of popularity and notoriety and publicity.

# TWELVE GREATEST AMERICAN WOMEN

## Senorita Graciela Mandujano of Chile Asks A Big Question

Photo from International

SENORITA GRACIELA MANDUJANO

By JOHN DICKINSON SHERMAN

WHICH is the twelve greatest living American women? This embarrassing question is asked of the National League of Women Voters by Senorita Graciela Mandujano of Chile. The Chilean lady was a delegate to the Pan-American Conference of Women recently held at Washington.

Along with a contribution of the National League of Women Voters she sent a letter to the league asking it to write up the twelve for home publication. The question is indeed embarrassing. There is, for one thing, an embarrassment of riches. If there were only twelve women in the United States worthy of being named in answer to the question, all would be well. But the United States has so many great women—to say nothing of the famous ones!

It's also embarrassing to the National League of Women Voters, for the reason that to answer the league must perforce name at least one of its own members.

And it's embarrassing to anyone asked to draw up a list—there are so many things to be considered. For example, from one viewpoint one would name as one of the "First Lady of the Land," Mrs. Warren G. Harding—and from another Mary Pickford or Mary Garden or Geraldine Farrar or Mary Roberts Rinehart or Ida M. Tarbell or Edith Wharton.

Again, one might serve Mrs. O. H. P. Belmont or Alice Paul of the National Woman's party or Mrs. Maud Wood Park of the National League of Women Voters; it depends upon whether one is or is not militant in the matter of women suffrage.

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## WIPE OUT THE SAVAGE ASSASSINS

**"Human Leopards," Liberian Secret Organization, Practically Exterminated by Government Officials.**

The Rev. Walter H. Green, Episcopal bishop of Liberia, who has returned to the United States on leave of absence, tells of the wiping out of secret organization of native assassins known as the "Human Leopards" which he declared several years ago while on a preaching tour in the interior.

**Mistake in Coin.**

Akron, O.—The Republican Ed does not have to be going to look twice before he hands out the coin this July a photo at the monetary novelty the last was passed around for the benefit of the waiters. When it reached Bear he dived into his pocket, pulled out what he thought was a dime, and dropped it into the hat. The waiters eyes bulged, and he gulped. Too late Bear found that instead of a dime his ego was a $2.50 gold piece he had carried in his pocket for several years.

## HELD UP ON WAY TO DOCTOR

**Negro Bandit Inflicts Scalp Wound in Struggle With Blind Victim in New York.**

New York—Walter A. Green, six-ty-one years old, accidentally used on his eyes descend of an eye and was temporarily blinded. He set out on a few clothes and was hurrying to the doctor's when a negro

stepped him and hit him on the head, inflicting a scalp wound.

Green fought. The police say he pulled a revolver and fired at his assailant, who fled. Then they say, the negro took the pistol, flung it and ran away with it. Green and his wife say he had only an imitation revolver, which was a perfume sprayer. Green's head and eyes were dressed in a hospital.

## RADIO

## VARIOMETER SET ON A VERTICAL PANEL

**Method of Building This Receiver and Setting It Up Explained in Detail.**

The radio receiver described here is one using a variometer for the tuning. The panel is mounted on a vertical panel, 6 inches by 9 inches, in front of a horizontal base board.

To support the panel in a vertical position, 2 pieces of base board four inches wide by six inches long and 1/2 by 3/4 of an inch thick is screwed to the panel.

The material required for the variometer follows:

One piece of bakelite or stiff card board tubing, three inches long and 3 1/4 inches outside diameter, or of sheet fibre conite.

Two pieces of bakelite or stiff card board tubing 1 1/4 inches long and 3 1/4 inches outside diameter. Cost about five cents.

One foot of No. 26 B.W. wire. Cost about 25 cents.

Two pieces 1/4 inch outside diameter brass tubing costing about 25 cents.

Four small blocks of wood as shown in Fig. 1.

One panel 6 by 9 by 3/4 inch.

Eight 1/4 inch brass bolts 1 inch long brass wood screws.

One base board 6 by 7 1/2 inch, the standard fourteen inch diameter dial and one piece 3/4 inch shaft, costing about 45 c.

Two binding posts.

Fig. 1b shows how the details of the variometer are put together.

The rotor is wound with an outside diameter of 3 1/4 inches, and 40 turns of No. 26 wire, each turn being separated with respect to the next by a space of the wire, the turns are not touching each other.

The winding on the stator is similar to that on the rotor. There are 40 turns wound into the rotor and stator slots. The beginning and the ending of the stator windings are 15-16 of an inch from the ends of the tube. When the rotor is assembled inside the stator, the winding on the stator should fall just above that on the rotor.

After the rotor and stator are wound, give them a thin coat of shellac and allow it to dry thoroughly before mounting. Wooden blocks are fastened to the rotor on the rotor and stator shaft to prevent the rotor and stator from coming out of alignment. Put the variometer parts in a hot dry place and allow them to dry until all the volatile matter has been driven off. This will give the windings a hard finish that will not absorb moisture and prevent them from mechanical injury and wear.

Fig. 1

Fig. 1a

Fig. 1b

Fig. XIII

Fig. XIV

Fig. XV

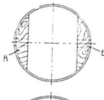

Fig. XVI

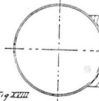

Fig. XVII

Fig. XVIII

Fig. XIX

Fig. XX

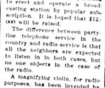

Fig. XXI

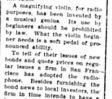

Fig. XXII

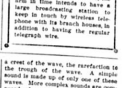

Fig. XXIII

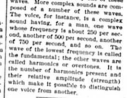

Fig. XXIV

Fig. XXV

Fig. XXVI

Fig. XXVII

## CRYSTAL SET IS ALL RIGHT

**In Its Own Way It Is Quite as Efficient as the Vacuum Tube.**

The small crystal receiving set which may be likened to "the poor man's radio set" is by no means extinct, as some imagine, is quite as efficient in its own way as the vacuum tube set and absolutely reliable. Take out-of-the-way places where there are no broadcasting stations at all, and the crystal set is the only one that will receive anything. Even in cities where there are broadcasting stations the crystal set is a favorite with many people because it is so simple and inexpensive.

The crystal set is not capable of receiving distant stations as well as the vacuum tube set, but it is capable of receiving local stations with good volume and quality. Many crystal set users have been able to receive stations as far away as 100 miles, but this is not the usual thing. Most crystal sets are used for receiving stations within 25 miles.

The crystal set is not a set to be used by the beginner. It requires a little more skill in tuning than the vacuum tube set, and the beginner is advised to start with the vacuum tube set.

## SPARKS

The man who uses helicopter theory in an aerial might at times be accused of "flying high."

The University of South Carolina, at Columbia, S. C., is planning to install a radio set in every seating section of its popular auditorium. It is likely that this will be done.

The difference between parts and accessories is that the parts go to the country and radio service is the kind that the country needs.

Radio is the only cloth, for radio purposes, has been invented by a modern genius. Even the radio beginners should be prohibited by law. What the violin teacher needs is a soft pedal of processed silk.

To tell of their losses of new bonds and radio sets is the latest fad. Our home is afraid the radio fiend has adopted the radio phone. Besides furnishing the music it has put the family in touch in time intends to have a radio broadcasting station. Keep in touch by wireless telephone. Listen in on the conversation. Big thrill. Only three dollars extra necessarily installed. Get one now.

**Marconi's Secret Radio.**

Guglielmo Marconi has announced success in carrying on radio communication for 100 miles so that only the parties called and calling can listen in on the conversation. Big thrill. Only three dollars extra necessarily installed. Get one now.

**Making Matches.**

Matches are turned out in huge quantities by machinery. The machines are in the end up great piles of wood into match splints at fabulous speed. The ends of the splints are then passed through a paraffin bath and receive their heads.

## RADIO TESTED ON A TRAIN

**Rain Storms Failed to Interrupt Communication on Run of 100 Miles.**

Keeping uninterrupted communication between the engineer and fireman despite rain and electrical storms was the test given to the radio telephone set ranger train run the 100 miles from Oklahoma City to Lawton, Okla., with a transmitting and receiving set in continuous operation.

The run established a record as one of the most severe tests ever given to any kind of moving train had been subjected to, officials said.

So clear was the reception on board the flying express that conversations could be heard by the music of the government radio station at Fort Sill. Weather reports and news dispatches were also received.

**Sound Waves and the Voice.**

Sound waves are waves in air. The air is alternately compressed and rarefied; the compression corresponding to a crest of the wave, the rarefaction is the trough of the wave. A simple sound is made up of only one of these waves. More complex sounds are composed of a number of these waves. The human voice is a complex sound having, for example, a fundamental wave of about 250 per second, another of 500 per second, another of 750 per second, and so on. The wave of the lowest frequency is called the fundamental; the other waves are called harmonics or overtones. It is the number of these present and their relative amplitude (height) which make it possible to distinguish one voice from another.



## The Efficiency Girl

By I. WRIGHT

The classified advertising offices have sang with excitement and cooing. Dust cloths unused for weeks were being dusted and several long polished desks, well-disciplined people were being passed every day. Even the ad takers stood all day checking up a constantly increasing number of words and costs of insertions in the classified advertising pages of the Chicago Mirror. Mary Connolly alone was unimpressed by the news of the efficiency expert who from the management's viewpoint was about, was evidently to come into the classified advertising offices to look about with the sharp eye of a keen detective, mapped very radical changes here and there as to lighting, position of desks and the cashier's cage. The worst of all—for instantly those clerks who were in any way inefficient.

"The top of the morning to you, Mr. McGinnis," she said gayly, taking out her fountain pen. "And why all of this hurry, scurry and fuss about? The efficiency man—if he's any efficient at all—will look you through your little finger."

"I wish you'd call me Roxanne," petulantly exclaimed Frank McGinnis. "And I think you're going to be the next victim of this man. The boss upstairs has seen him work before and he told him that he can have any one in the whole place he wants to assist him. Wouldn't that beat the cat's pajamas? The efficiency girl!"

He audibly groaned old lady had come up to the desk and was in front of Mary Connolly. "Did you have a advertisement to put in, madam?" asked Mary pleasantly.

"Yes, I do," answered the old lady in a shy voice. "I don't think I was standing here correctly. Should I have handed it over, where there use new along, did you?"

Mary suppressed a smile.

"I beg your pardon," murmured Mary, "perfectly all right, and a settlement for you?" She was looking at the ad which the old lady had given her.

"It's not much to write just say: Wanted: a room."

Mary looked at her child were many of the advertisers pleased with her and the results they got out of them. But this one! No one would have even the slightest interest in such part of the city it was denied what type of room you wanted, and with their commonsense coat or less convenient cause to be interested in any one. Mary suppressed a smile—a hundred times flashed through Mary Connolly's mind as she was seeing the little old lady with her shabby black bonnet and shawl that inexpensive room was desired. Yet she could not be rude.

"Suppose we put in just a little more," she suggested in a kind voice. "It doesn't tell much—just 'wanted: a room.'"

"Doesn't tell much! Doesn't tell much!" exclaimed the old lady. "Why, I'm not going to hire an idiot, will you? I want to get a room. Been here at nine—I'll tell him the whole thing, that I am a widow and I'm dead!" Angrily she shook her head at the bewildered girl and walked out red and white by turns.

Mary looked after Mary, wondering how efforts could have taken such a turn. Then she began to write out and calling a passing boy told Jerry to rush an ad.

"Wanted: a room," she read aloud and Mary pass not surprised at all, excited was the hour like at all lady call him John and tell him that the ad must be published in full."

"I—again gasped Mary. "We have orders to assist in the advertisements whenever it is possible. You see," she explained to the boy, "we have been less than two lines, and so I wasn't trying to do you out of your good money out. It was just that if she had written that she was a widow and what price she wanted to pay or what kind of room she wanted, and that she was receiving boarding or light housekeeping, you see you would get a lot more replies. I was thinking of the answers she would get. Now, Mr. Connolly's blue eyes filled. None of any sort would answer her ad. Just a plain advertising—three and there was no doubt that she would get a room in such a scene as this. Above that, however, she was not to be cheated out of the gentle little old lady in her faded coat.

She heard across the polished counter the tale of the old lady's woes. Mary Connolly was a girl who was not afraid to say the whole thing in low tones. Several times during the day Mary and also was aware of the interested eyes of the efficiency man. In a few minutes the little black bonnet of the old lady began to appear.

"I had a bad night in that hotel—

didn't sleep a wink," the old lady told her. "Say write it up. Make it as long as you want, and make it right. I guess I'll go and get a breakfast. Say, you're all right for it anyhow. And, John, if there's any lady would help me—well, I'd get some clothes if she'd help me choose them. I'm sure she wouldn't be afraid to tell me if anything was too young or too old for me. She was smiling at Mary now, happy as a child, the ancient bonnet forgotten.

"The boss upstairs told me I could have anyone I wanted to help me. I think I'll have to take Miss Mary for some into which you are interested in," said the old lady.

"Other and best thing you've done," said Mary Connolly, now the efficiency girl. "Just the little extra gain and go for her coat and hat. Burton, that's the boss, was surprised, too, when he passed along that way to be buttoned by the new efficiency man, who said seriously: "Say, Burton, old man, I think you've got that good looking look about for a new ad-taker. I've been looking for one for days, but neither didn't like and as a—as—the new one look to me like Mary Connolly—well, it took my breath. I don't like to think the thought of me, but that's the one of being an efficiency girl. I can't fearry the girl I love."

### Subvention of Ninth Wave.

An idea not long existed that the ninth wave is always more powerful than the eight which precede it. Dr. Gould, in Gold's time, which was irregular, with each eighth wave the largest. England speak of this wave as the "subvention" wave. The claim that the ninth wave is more to be feared. In Southern California it is generally believed to be created by being washed in nine surfs, the difference of forward and that there are three great waves which in the succession, in which is highly dangerous to launch boats. A Japanese fisherman's wife was recently rescued by serpents which the fisherman had cut in two and left them out of Ireland. The mystic number 9, 3 and 81 have been generally used in connection with the ninth wave, which is supposed to be circuits which were not easily understood.

### Lehergein,

Lehergein, the knight of Swan, is the hero and one of Wagner's operas drama. The story of the knight of the Holy Grail and a swan, to champion her cause. His enemy, Telramund, and his wife, Ortrund. In the first great struggle between the forces of good and evil the champion is killed by the treacherous Ortr