EXPLOSIONS IN MINES

Cansed by Reckless Disregard of Rules and Danger.

medreds of Lives Blown Out and Fearful Distruction Wrought Through the Lack of Carefulness.

The practice has become very prevmient of giving little heed to the amount of gas present in the workings enorpt when this gas has accumulated est some high point or in some chambur to such an extent as to be dangerwen Mines worked with naked lights, and in which gas is generated only in small quantities, or it may be at irregular intervals, are the most danperous class of mines. It is in these unines that the worst explosions have taken place recently, resulting in the loss of many lives, states Mines and Monerals: Out of a total of 22 mine emplosions occurring in the bituminous region of Pennsylvania from 1884 to 330) and causing the death of 291 persons, but four of these occurred in mines where safety lamps were used.

Referring briefly to the bare facts comtained in the record of these disasters appalls one with the seriousness of the conditions surrounding mining work. Mines that have been considered safe and free from gas anddealy become the scenes of fearful destruction both of life and property. Buch was the recent Fraterville mine emplosion in Tennessee, May 19, 1902, he which 184 lives were lost. The mine we to the time of the disaster had been considered entirely free from cas. The report of the disaster made after a careful investigation states that gas was liberated from the overlying strata owing to a creep extending over a

portion of the workings.

At Johnstown, Pa., the explosion in the Rolling Mill mine, July 10; 1902, and 112 lives; also in the disaster at Pernic, B. C., a month earlier, a large

number of lives were lost.

At Johnstown gas had been found

to certain dip workings in such quangested on the use of safety lamps in that portion of the mine, the report of the explosion ascribes the cause to The use of open lamps by some men where safety lamps only were permitted. These men, failing to realize the near approach to an explosive conwithou of the mine air at that point. were using open lights. After the explesion the safety lamps that should have been used were found carefully had aside while the naked lamps Abut caused the trouble were found where they were blown. In the great emplosion in the Mammoth shaft, of Westmoreland county, Pa., January 27 1937 109 lives were lost. Here also "be mine was practically free from gas open lights being used. The mine was affected by a squeeze at the time which, according to the report, liberasted a large amount of gas suddenly Trem the bottom, which, coming in contact with the open lights of the men, caused a fearful disaster. A beaving of the bottom had been nothird for a few days previous to a terrible explosion in No. 2 mine, at ₱≠/senring, Pa., February 20, 1884, Acgrowing to the report no gas had been metrical in the mine provides to this explosion and oney lights were used to all parts of the game. In a slope at Foungstown, Pa. October 27 of the mame year, an open door was the enuse of an explosion whereby 14 miners were killed. The door was found open having been set open by a driver a few moments before, and was closed emegain: the gas that had accumulated in this short space of time was driven down to the face and ignited by the open lights of the men. In this case , 900 much reliance was placed on the fact that the ventilation was ample for diluting and carrying away the mall amount of gas that was pres-

One familiar with the habits and disposition of the ordinary miner re--affized how hard it is to get him to use even an ordinary amount of care for the sake of his own protection and that of his fellows. He will enter an abandoned place, fenced off and man; ed with a danger signal, despite segulations and restrictions enforced t the pit. With an open light on his beard and a safety lamp in his hand. banging low down at his side, he will conter a rise heading tooking for gas, which he sometimes finds to his own ###romfort and that of others Strange as it may seem, this is not fiction, but a master of record. The safety lamo to some men is a mere tool or instrusee at for telling how much gas is present, rather than affording a needed preferion and the lamp is carried in-So the mone mone as a peak or sledge r a banimer or saw.

a hammer or saw Taking fore of the Pennley

A new and year constituting that to men matrate to less and girls that of will take are of the pennies the shillars will take care of themselves has re ently been discovered by the mapple of one of the patter's hoots in Wa bington, D. C., the national cap Ma! These young people is ting under the direction of their principal have gitar of a school unvisors bank, which by a partie of in every way just like the greet institutions where their fathers phose their money for safe keeping like for the sale keeping of the funds and at the cose of each day's business deposits the daily receipts in one of the city's ordered commence at bank. bug institutions st N. holas.

Buddhists in Sandwich Islands. The Buddhists are to sing temples in many parts of the Soudwich islands, and the membership is running more the thousands in some places shurches which were foult for Christian Japanese were taken over by Buddhists.

LATEST ABOUT BRAINS.

Rome Recent Observations on the Relation of Skuils to the Mental Powers.

Man's curiosity is naturally boundless concerning his brain, which is
believed to be the seat and the token
of that mental power which makes
him the undisputed king of the earth.
If the brain were really such a box of
drawers as some phrenologists have
assumed, with everything in its place
and all possible faculties accounted
for, human beads could be classified as
readily as plants, and nobody could
fail to distinguish between them any
more than one can fail to select roses
from lilies, says the London Express.
One might predict absolutely from

One might predict absolutely from a glance at his head that a given young man must become a great financier or a poet or a philosopher, with no more danger of a mistake than in asserting that one tree will produce acorns and another apples. But the shrewder sort of phrenologists see that this will not do, and so they endeavor to modify the bases of their selence to soit the infinitely varied facts of human nature and development.

The real progress in brain study is made by those who undertake the work as far as possible without any pre-onceived and preperfected theory to lead or mislead them. Dr. H. Mantilegia has recently published in the "Proceedings of the Royal Scientific Society of Bohemia" some remarkable observations on the relations of the weight of the brain and the size and shape of the skull to the mental powers of man.

These investigations show the importance of good feeding to brain development. The brain cannot do its work without an abundance of pure, well nourished blood. Other things being equal, a heavier brain implies greater mental power, and Dr Mantiegka finds that persons employed in industries where the nourishment of the body is apt to be insufficient and the muscular exercise slight, show, as a rule, higher brains than do more favorably circumstanced persons.

Blacksmiths and metal workers in general have heavier brains than coachmen, but the latter exceed carpenters in brain weight, and carpenters exceed persons employed in clothing industries, while at the bottom of the scale stand those who are engaged in the manufacture and sale of alcoholic drinks, who are apt to do more

or less drinking themselves
It would also appear that the weight of the brain may be increased by the direct exercise of its own function, men of mental training showing, as a rule, greater brain weight than others. It should be remembered that the size of the head cannot be taken as a trust-worthy index of the weight of the brain. The organic quality is the main

AIPSHIPS OF THE FUTURE.

The Science of Aeronautica Glien Fromise of Aerial Savigation in the Year Future.

Wireless telegraphy has not yet reached the a misal perfection, although new cases are tradily sent and received by this won terful a stem. And yet the - **क**ारां दे - व्यक्तिमानाकृताना व जन्मा निर्माण कार्या देशकारीक्षक्ष (१९३१) । निर्माण wireless to appay as a matter of course. In this arm of an at achieves ment and discovery a seems as a nothing is two stopendars for man to ordertake, and that far iffero evolve son, ching useful, as will as wonderful, is the exception, not the rise, says Aeronautic World Some third that has sheen attempted has a nor been brought to perdection yet, but there is nothing ais couraging in this. Obstacles serve only to spur hun, it genius to renewed action and preater exertion. We travel by land and sea at a rate of speed that 100 years ago world have been called the result of witch milt. We do not travel through the air with equal facility at present, but we may do so within a few years, we the efforts of men of brains along this line are certain to gain the mastery of the air as they have of the land and sea

Those who scoff at the student of aerial navigation and scout the idea of success attending the efforts of the men who seek to discover the secret of flying, may live to see the heavens dotted with ships sailing as planidly through the air as vessels now unligate the seas. In the opinion of the United States commissioner of patents, the dirigible balloon or the aeroplane will be successfully evolved during the year 1904. This prediction may be based on false premises, but there can be no gainsaving the fact that great strides in the direction of aerial navigation will be made during the present year. The spir t of inventors will be quickened by the offers of a large reward by the St. Louis exposition managers for the most successful exhibition of a Wing machine. There will be many comp titors for this price, and Yankee incensity will vie will foreign in an effort to projuice amoir hip that will not drive breader hooter beens in the colorest of to-

the wird, but be perforty ontrollable

Indians Who Security Work.
It has always been a theory agroup

west-riers that as Indian a full Wood would not work. But all this enger to Indians from Haskell institure have been at work for the Santhe Felipean Emporial Side by side with them a gang of Groves has been employed and the ratifical bosses say the Industracted the Greeks in every way. Indeed it is accordingly edged that the Indians made the best workmen of languingaged on the road, and there. are gange of several paremaints a omplosed near Emporia. All summer these Indians many of whom belong to the football and baseball teams at Haskell have been no their practice. in these games. They never seem too tired to play a game of bull, and they have beaten all the beam- in the neighborhood Kansas City Journal.

PHONE AT THE TABLE

The Instrument May Now Be Used While One Is at Meals.

Great Convenience to Men of Business
Who Think They Cannot Waste
Time Waiting for
Watter.

A man accompanied by two women entered an uptown restaurant the other night and sat down at a table near the wall, toward the rear of the room. After the man had given his order to the walter he added:

"Oh, yes; and bring me a relephone."
"A telephone?" repeated one of the women. "How can you eat a telephone?"
"It's the latest wrinkle," responded

the man "Wait and you will see".

Sure enough, the waiter returned in a few minutes with a desk telephone and several yards of silken electric cord. The telephone was placed on the dinner table, and the waiter then attached the silken cord to a socket in the side wall.

The man of the party picked up the receiver, moved the telephone into a convenient position and then asked central to give him the box office of a Broadway theater. After ordering three sears for the performance that night he asked the women with him if they had any message they wished to sead to anyone.

One of the women telephoned to her hotel about some rings she had mislaid, and the other telephoned to a triend relative to a shopping engagement for the next day. By the time they had finished with the telephone the waiter had returned with the dinner. Before serving it he disconnected the silken cord from the wall socket and carried the telephone away.

These portable telephones," said the head waiter of the restaurant, after the party had gone to the theater, "are novelties which are fast becoming popular. We have just introduced them here

We have just introduced them here
"Each table is so arranged that there
is a socket handy to which we can attach a portable telephone. The wires
all lead to a private branch telephone
exchange which we maintain in an upper
room. Each wire and socket has a number, and a guest at a table can arrange
to have a friend call him up on the
telephone while he is at dinner.

Of course we charge something for the service. If you will read the bill of fare you will see that the charge for a telephone at the table is only 25 cents. In addition to this charge for making the connection there are the usual charges for each call.

These phones are a great convenience Many men become impatient while waiting for the waiters to servetheir orders, and a table phone often serves a useful purpose by giving diners something to keep them busy.

"Another advantage is apparent in the business part of the town. Brokers going out for lunch can reserve certain tables in advance and keep in constant communication with their offices, even though they spend an hour or more at funch. It enables them to eat with more composure.

"Most of the high-priced restaurants are installing these table phones, and, they must be appreciated by the public, for often half a dozen are in use at the, same time in the establishment."

ANCIENT MEXICAN CITY.

Buried Metropolis Discovered by Exensutors in the State of Conholin.

Dr. Na holas Leon, archaeologist and ethnologist, of the National museum. If Mexico, lately returned to the City of Mexico after a stay of two weeks in the state of Coahuila, where he made several important investigations of the recent finds of cities and animals of antedituvian times. In giving an alcount of the trip, says are port from that city, the doctor said:

"The discoveries made at Paradon in Coahutta, are the most extraordinary) that have been made in Mexico, and, possibly, anywhere in the world. The excavations made so far show that a large city was buried not far from the present town of Paradon by an immense amount of earth, which was evidently washed down from the mountains, by floods. How long ago the catastrophe occurred cannot be determined.

curred cannot be determined "Portions of buildings so far unearthed show that the city—at least the largest of the cities that were covered by the debris of the flood, there being at least three cities destroyed—was very extensive. The indications are that there were many massive structures in the city, and that they were of a class of architecture not to be found elsewhere

In Mexico

"According to the estimates of the scientists under whose directions the excavations are being made the city is question had a population of at least to hom.

The destruction wrought by the flood was complete. All the inhabitants of the cities were killed, as well as all the animals. Skeletons of the human inhabitants and the animals are strewn all through the debris, from a depth of three feet, showing that all the debris was deposited almost at once. Measurements show that the debris is on an average 40 feet deep where the largest

Sanimat Football.

of the ottles atoot "

A bill was recently introduced in the Ulinois legislature to prohibit the same of football in the State university and other institutions of learning supported wholly or in part by the state. The prohibition is made also fare by the bill, and any breach of it is to be characterized as a misdemeanise, the maximum penalty being a fine of \$100. Not only are the students forbiden to play the college game, but presidents and fa ulties are forbiden to permit it.

POLICIES FOR A PENNY.

Insurance Certificates See Issued
Through the Medium of biot
Machines in London.

It will shortly be possible to obtain an accident insurance policy by means of a penny-in-the-slot automatic machine, says the London Express.

Penny-in-the-slot insurance is not as new idea. Two years ago a machine was devised which issued insurance policies against accidents for the sum of one penny, but unfortunately it proved to be an invitation to fraud.

The machine left it to the honor of the purchaser to write on the licket the time aand date of purchase, and many tickets were bought after the accident

This difficulty has been overcome by an invention which has the appearance of a clock in a glass case and which was on view recently.

When the penny is dropped into the slot and a handle drawn forward, a sharpened pencil drops out and an opening is disclosed upon which the customer signs his name. The handle is then pushed back, the space closes, an insurance policy is issued, and against the signature inside the machine is printed the date and exact time of issue. If the purchaser meets with an accident within seven days of the issue of the policy he applies. to the law accident insurance society, and if his name is on the register he receives a weekly allowance for five weeks. Anyone will be able to insure up to the amount of his weekly wage each penny invested providing ten shillings per week.

Attached to each policy are four coupons, and on presentation of these to tradesuren in the neighborhood of the machine a discount of 1 penny in the shilling on all goods bought up to

four shillings will be allowed. Thus the wise workman who is earning $\pounds 2$ a week will, after investing 3d, in the machine, hand his wife $\pounds 1$ 19s, and 12 coupons instead of $\pounds 2$. The balance of 9d, he can give to the fresh air fund to provide one child with a day in the country. On this basis it can be argued that he gets his insur-

on each penny inverted, it is proposed to place these machines in factories, warehouses and mills where large numbers of workpeople are employed.

TWO STOCK EXCHANGES.

Difference Between That of Yew York
City and the Bourse of
Berlin,

If any member of the New York stock exchange who is entirely unacquainted with German speculation should visit the Berlin bourse he would find at every point the most striking divergencies from his home experience. He would be surprised to see the bourse attended by quite 2,000 persons, including clerks of banks, newspaper men, and even visitors like himself, writes Wilham C. Dreher in The Berlin Bourse in Century, Also he would be inverested in the immensessize, of the half -300 feet long, divided by colonnades Into three sections, one of which is assigned to the produce exchange. On one side of the hall several doors open into a grassy court, shaded by trees and surngunded by a pillared lobby, where brokers sic in dull summer days and float their latest stock of anaegiotes

That shaded court is suggestive of deeper differences between the New York stock exchange and the Berlin in virution. In New York the number of member is fixed and is small in proportion to the immense volume of business done: in Berlin there is a great horde of small dealers, and the amount of trading is much less than in New York. Owing to the easy terms of admission, the bourse becomes a mere place where traders meet to effect their transactions. There is no sale offiscats. In fact, no membership fee exists, but only a small yearly tax is collected, which varies from time to time as the expenses of the organization require. Contrary to New York practice, membership is largely held by companies and firms. Nearly all the banks of the city, for example, are members and the more important ones keep above a score of their emploves on the floor. Thus the indiidual New York broker, as a rule, counts for vastly more than a member of the hourse. New York is contentrated, is intense; Berlin disperses its energy, and is comparatively dull. It knows nothing of those great days of triumph or disaster that render the annals of Wall street picturesque; and r lacks our large, daring operators, who startle the country with their hold

Knew Win Rights.

The two newshoys had quarreled over the possession of six cents, of which the smaller boy insisted be had been defounded.

They proceeded to fisticulfs, and the smaller box was whipped.
"You looked me, all right." he said, wiping his bloody nose on his ragged shirt sleeve. "but I'll fight ye agin, if

ce don't fork over two cents of dat

"What fur?" demanded the other boy; "Doggone ve, I got a right to claim de loser's end of de purse, ham't U". Chiscago Tribune.

Coal workings around Cheadie in North Staffordsings around Cheadie in North Staffordsinge. England, have been traced back as far as the reign of Richell III. The early naming is explained by local geological conditions, as the coal seams instead of being hidden unter drift as in other parts of England—were brought to notice through dark greaks turned up by the plow. A late its overly is an old level that must have

been driven at least 300 years ago for

RIVAL OF AMETHYST.

Discovery of a New Gem Called
After Finder, "Kunzite."

Stone Found in San Diego County, Cal., in an Clear as a Diamond --Some Interesting Parthoulars.

Lovers of jewels will be delighted to learn that a valuable addition has just been made to the vasiety and stock of precious stedes. As cut for mounting, the new gem, kunzite, exhibits an exquisite lilac tism, deeper than that of the pink sapphire or topax, and lighter than the purple of an oriental amethyst, reports the New York Tribune.

Although the discovery of a fine quan-Mity of hunzite is of comparatively recent occurrence, the existence of a poor grade: and of allied species of the same mineral has long been known to specialists in that department of science. What is known as spodumene has been found in Brazil, where it him a reliewish tinge. and in North Carolina, where the color is green. For that reason the latter kind, technically known as liddenite, is sometimes called an emerald, although its composition is not identical with that of the red emerald. Finally, small bits of pink spodumene have been picked up in Connecticut. These are believed to be the remnants of larger, and possibly handsomer, masses, but have not possessed sufficient beauty and size to justify consideration.

The new stone, uncut samples of which are to be found in the Morgan collection at the Museum of Natural History, comes from California. It has been found in two places near Pala, San Diego county. One hardly knows which to admire the more, the exquisite roloring or the purity of the new gem. Some of the other varieties are translucent or opaque. This is as clear as a diamond.

As taken from the earth, the stone has only a slight luster. The masses of crystal are flat, like cakes of camphor gum, though of different him. From a superficial glance one might suppose that they would split up into

the materia is almost as hard as the group of stones to which the rather comprehensive name of samphire is given. This includes the ruby, emerald, amethyst and blue sapphire. These are all forms of corundum, which in an impure state and ground to powder is known as emery. Pure corundum is an oxide of aluminum Kunzite, like other varieties of spodumene, has a more complicated composition. It is a silicate of alumina and lithis. One of the largest pieces found in California is eight inches long, four imples wide, and over an inch and a helf in this force.

half in thickness Owing to the great importance which the lilac unted stone derives from the dis overy in California, mineralogists have feat that it needed a new and specife this Almost simultaneously Prof. E S Dana, of Yale, and Dr Charles Baskerville, of the University of North Carolina, proposed that this designation by derived from the name of Dr. George F. Kunz, president of the New York Mineralogical blinb, and one of the most agrossplished of the world's experts in points. The servertion was THE COLUMN TWO IS NOT THE PARTY OF THE PARTY there tornely instrumental in anatomic the California discovery, and was a accordance with a well established presedent samong mineralogist and naturalists

While the frimmic charms of the new sem are alone suffigent to rive in importance it is possession of a unique quality has been observed which is sure to create a sensation Kunzite has the power of fluores energy or continuing to glow faintly after it has been subjected to the influence of Roentgen mays. Dr. Baskerville who has been making a special study of the mineral at the Museum of Natural History, reports that during an exposure of five minutes a piece of this stone would absorb enough radiates to photograph itself upon a sheet of sensitive paper, when left in a dark room, and would also be faintly soil Jureinous for several minutes

Flies That Pester.

The presence of these in the house is a reproach. It is a failing away. from a hygienic standard, for the fly is a postilential fellow. It must be admitted, however that it is very difficult to keep habitable places free from flies. Poisonous fly-papers are unsightly, and glutinous cords and traps are not very pleasant accessories. in the household. Yet it is a matter not only of comfort but also of health that the fly should be excluded. The By may easily be a pathogenic agent owing to the fact of its choice of enpronment being oftentimes of the most discusting character. When a #c walks acres a suitable culture me fillm it leaves intection behind it, as shown in the colonies of organisms which develops on the points with which the insect's leas have been in contact. The fly, therefore, should be driven out of our haunts. It is a curious fact that flies will not pass through netting even though the meshes be quite large unless there be a source of light, as from a window, behind it. Thus, in rooms with windows only on one side a net over the window will absolutely keep the flies out, although the meshes of the net may be an inch apart. - Lancet.

Cost of Touring in Europe
A comparative table of the cost of

A comparative table of the cost of touring in various European countries has been drawn up by a cyclist. Taking England as the basis, he finds that Scotland is dearer, Ireland works out much the same as England, but the accommodation is not so good. France, Italy and Germany are all about 30 to 40 per cent chapper than England, while Beigium is lowest of all.—N. Y. Post.

PLUENT UTTARANCE.

Of its Kind It Was 411 Night, and it Immediately Settled the Bill.

Hockley has mounted to basiness success despite the handleap of s pronounced statter. Though he is conscious of the credit to which he is entitled for not "lying down" on account of his infirmity, it does not follow that he would not willingly part with it. In fact he has made several efforts to find some method of regaining normal fluency of utterance, relates the Chicago Daily News.

A year ago liociley saw is an advertisement what he conceived to be his opportunity. It was a Boston concern which promised to cure stammer-ling in three months or no somey! would be required. Hockley sent for circulars, which dufy arrived and proved to contain an abundance of testimonials setting forth in a most convincing manner that Hobber's stammer cure had effected wonderful results and could be absolutely refled.

upon Hockley was encouraged to forward his name for enrollment and then ne confidently began the treatment. For a time he was even afte to persuade himself that he was making progress—that is, until his panner took him aside one day and remarked, confidentially.

"Say, old man, do yog know you're setting lots worse with that stuffer of yours." I have been noticing it especially the last two or three weeks."

But Hockley was not easily discouraged. He kept faithfuly at the courseuntil the three months were up. He even gave it an extra two weeks for good measure; then he dropped it

Promptly from Hoston came a letter expressing pleasure that he had been cured and nitimating a design that he should send a testimornal. A hill for \$50 for his treatment was inclosed. Hockley sent the testimonial.

who may be seeking refrequence with may be seeking refrequence with Biobler's stammer cure. When I first began I stattered about every fourth sentence. After only these months and two ways faithful a manage of directions I am-now able to, and do, statter every time I attempt to speak, and even my friends avoid me. Anyone addressing me can obtain further information, and to those who call upon.

me I shall be glad to express myself

with a great deal more emphasis than

print this testimonial F.

After several emphasis requests from Boston for the \$50 there was a jult and Hockley almost format the matter. Then one day a law-or with whom he was not on frienly terms walled into Hockley's office.

Mr. Horliey he begin with a show of trenges as he pullyd a paper from his power. "I have need a hill for \$10 from the Blobber Stammer Che in time for uring you of stat ferms, if two day not vay it at once I am instrumed to be in the form of the bring \$1 and will do so the afternoon if new very."

Fig. by arise and planet for housing at his visitor for a money. His lips moved as if he were religion a rightle.

The first transformation was a supported to the fifther transformation of the support of the sup

account of the specifies the specifies be to the specifies but the specifies be to the specifies be to the specifies the specifi

of the Biolder institute A CASH TRANSACTION.

Minister Didn't Care to Take a Chaneon What the Bridegroom Was betting

The cautious young name who had the reputation of having a remarkably $g(\epsilon)^2$ business hear went to see the minis-

the asset, relates the obtained? The asset, relates the obtained? The asset, relates the obtained? Popt.

"For our services," the minister are sween, two make no harge, but it is er continuous for the groun to give is a fee continuous rate with his financial and social standing. We ruther expectly, you know that the woods the groun know what

he's going for his mode; "" asked the cautious man.
"That's his business." replied the min-

ister.
"I suppose it's a each transaction."
"Why yes, I suppose it would come

unger that classification
Coundn't I make some other areasysment**

TSuch a. what? The twelf a year and then I will care you whatever I find your service clave be in worth to me adventure they do have a hundred to lars.

maybe meet. The minister excool his head, and don't believe I'd care to risk it." he said. "A little matter of fix dollars on the wedding tay would be in negatisfactory, for in a year you might figure it out that I owed you money. Just because you are willing to take changes with some particular air' is no reason why I shoult

In Ear me there is any one species of wild sheep. It is known as the mouther, and it inhabits the mountains of Corsi a and Sartinia where mouther stalking is a favorite approxime passime.

Leterinary Bentlyts

rish anyth ment her "

It is only within the list three years that the dentist has come to give the horse serious attention. And yet there are but one or two thoroughly qualified horse dentists in the country, and they are look on, the year reand

L'ABEILLE DE LA NOUVELLE-ORLÉANS

arage sign coal tract.