

Made in Nebraska



Light Bills Reduced by Using Automatic Electrical Switch

Much electricity is wasted by people who forget to turn off their lights when not in use. In the ordinary household this item of loss is not always of serious importance; in the case of large hotels, however, carelessness on the part of guests who willfully or absent-mindedly do not turn off their lights when leaving their rooms, often results in considerable unnecessary expense.

A device recently perfected which automatically turns off the lights when a guest leaves his room, will appear for the first time only to hotel proprietors, but to managers of office buildings and other buildings of a public nature where the cutting down of unnecessarily high electric light bills is of moment.

The device referred to consists of a switch operated in connection with the lock of the door of the room. When the door is locked from outside, the turning of the key automatically throws a switch and opens the electric circuit, turning off all the lights in the room. Where this scheme is in use the patron unwittingly exercises the same degree of care with regard to the house lighting bills as he does with his personal property, which he leaves in the room. If he is too absent-minded to lock up his belongings upon leaving the room, he will of course forget to turn off the light as well, but fortunately for all concerned, this type of absent-mindedness is not frequently encountered.

Gate City Stationery Modern.

The Gate City stationery company, 1104 Dodge street, is one of the most prominent firms of its kind in the state. Printing—high class work—is one of the features that has made the company a good business. Blank books and loose leaf ledgers also are made and sold here. The firm prides itself on producing high class work. The quality is very fine and the prices maintained are the lowest. Special orders are taken and given detailed attention. The management is also pleased to make suggestions about jobs and to offer assistance in every way in which it is possible for it to do so.

Bjornson Company is Producing a High Quality Work Here

In the matter of good, substantial work the Bjornson Sheet Metal Works, 215-25-27 North Fifteenth street, Omaha, stands away up at the top of the rest of the really efficient firms in its line. This company manufactures sheet metal cornices, skylights, flues, hip rolls, gutters of all kinds, tin, iron and copper roofs. It does an immense business and employs a large force of men. The quality of the work is the thing that counts, and the Bjornson Sheet Metal Works prides itself on the fineness of its products.

Bemis Bag Company One of Largest of Its Kind in the Country

The Bemis Omaha Bag company, which has a splendid exhibit at the Made-in-Nebraska show, is one of the largest branches of that concern, having an investment of \$200,000 in this city and employing 250 persons. Its building at 15th and Jackson is 60x120 and six stories high, equipped throughout with all modern conveniences for the making of bags of all kinds, horse blankets and fly nets.

The company does an annual business aggregating \$2,500,000 and its territory extends over a wide range of middle western country, including half a dozen states. All kinds of paper and cloth sacks and bags are made at the plant.

A large woodworking plant of the great southern lumber regions in Bogalusa, La., is an excellent example of strictly modern working conditions.

The plant has an annual production of 175,000,000 feet of lumber. There are more than 100 electric motors in use in the various buildings. The buildings are not compactly grouped, but are arranged for a maximum production and with electric power the energy developed in distributing with small loss for all of the machinery is operated from one generating room.

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Hastings Milling Co. Makes Chicken Food of Very Fine Quality

"Silko" is the name of the good chicken food which is manufactured by the Hastings Milling company of Hastings, Neb. It is the food on which chickens grow fast and become healthy. The milling company guarantees its food. It does not use screens or weed seeds in making the product, and aims to put the best kind of chicken food on the market. All the products of the Hastings Milling company rank high, because of the quality of the ingredients and the thorough care that is given to all details of the manufacture.

Millwork of Fine Character Made by Adams & Kelly Co.

The Adams & Kelly company has an interesting display at the Made-in-Nebraska show, exhibiting a full line of mill work from its factory at 1500-24 Nicholas street.

The mill work industry in Omaha, including wash, doors, mouldings and finish, is one in which outside competition is not felt, because of the cost, delays and misunderstandings which always come when mill work is bought away from home.

Mill work in Omaha is furnished by three classes of concerns. First, the jobbing house, furnishing the regular designs from their stock and special work from an outside factory; second, the planing mill, which, of course, carry no stock and make all parts to order; third, one factory only, which combines both services, having both jobbing stock from which regular sizes can be delivered immediately, and a special work factory, making odd work right here in Omaha.

Owing to the fact that when the mill work is delayed the time lost by carpenters amounts to so much, it pays the builder to investigate the facilities of the concern which makes his mill work.

Oldest Tannery of Nebraska Owned by H. Holm of Lincoln

H. Holm of Lincoln is proprietor of the oldest tannery in Nebraska, it being located at Lincoln, and is known as the Lincoln Tannery. It was established in 1858 and is one of the largest. Mr. Holm has succeeded in building up a large trade through thorough and straightforward business methods. He invites the public to send for price lists and catalogues, and is sure he can interest all in his goods.

"Senator" brands of ham, bacon and lard are made by Kauf & Rinderspacher, wholesale packers of Hastings, Neb. They are the only packers in the state outside of the big firms at South Omaha, but they have a complete plant that does a large business each year. It is modern in every way and has a splendid ice plant in connection. The truckage facilities give Kauf & Rinderspacher excellent advantages for shipping their goods to all parts of the west. The firm is a progressive one whose growth has been steady and substantial.

Haney Exhibit at Made-in-Nebraska Show of Interest

One of the most interesting of the exhibits at the Made-in-Nebraska show is that of J. H. Haney & Co., showing the high-grade harness, saddles and saddlery goods which are manufactured in the plant of this company on South Thirtieth street. The quality of the exhibit as well as the beauty of many of the articles have caused a great deal of comment during the show. In many ways the exhibit is unique and is one which interests all visitors. This firm is one of the most successful in the harness line in the west.

Latest Addition to Good Things Made in Nebraska

Jay Burns Bakery--Where "Holsum" Bread is Made

There is a man in Omaha who dreamed a dream. He dreamed it for many years, and at last it is coming true. His name is Jay Burns, and his dream was of a great bakery, which should be the most perfect in the world—the world, mind you; where the very best bread that it is possible to devise should be made, where everything should be absolutely and scientifically exact, including even the air, which the simplest could penetrate into the farthest corner, where all the work should be done "in the open," so that anyone who would might watch, step by step, the snowy flour grow into the snowy loaf with its golden crust; where marvellous, swiftly moving machines should take the place of hands; where everything should move with perfect uniformity and regularity, timed and adjusted like clockwork, so that each loaf turned out bearing the stamp of this bakery, would be equally and always, day after day and year after year, up to the highest standard of bread that it is possible to produce.

Dream Comes True.

And when this dream had taken shape in his mind, Mr. Burns set about to realize it in the most definite and practical way he knew. First, he travelled all over the country and visited every bakery he could find. He studied their good points and saw their weak spots; he made a careful investigation of all the modern machinery used in any of them, saw what results were produced by the different methods. He learned that most of the big bakeries are just little ones, which have grown up, and that their owners are making bread in the same old-fashioned way they used to years ago, with the same faults and defects, only on a larger scale. Mr. Burns made up his mind that the modern baker ought to learn his business just like a profession, study it from the outside as well as from the inside. So he came back to Omaha—for he knew that the people in Omaha like and demand goods things to eat—and he has built, on the corner of Cumings and Twentieth streets, a splendid, solid, slightly bakery on his own design, of brick, concrete and steel, costing, with all the modern equipment, \$1,200,000; with a daily capacity of 2,000 loaves, fireproof, dustproof and "air-proof," and on a lot large enough that as Omaha grows, and the "Burns Bread" reputation grows, the capacity of the bakery can easily be doubled.

In Front of Glass.

Half of the process of breadmaking, and the most interesting half, is carried on in front of the great plate glass windows which form the front of the first story on Cumings street, so that anybody who is passing may stop and watch it. This is the keynote of the management. Mr. Burns invites inspection; he invites the public to come and see the whole process, any day and every day. He has even fitted up a special inspection room for the women who want to see how his makes his bread. 1,000 loaves at a time, instead of one or two. If he has time, then you will learn many things about breadmaking that will be entertaining and profitable and well worth remembering, because the production of every loaf of bread is a renewed miracle, involving the most complex and mysterious chemical changes, even yet but dimly understood.

Logically the first place to go is to the great storeroom in the basement, where

thousands of bags of flour are kept, the room made as dry as punk, so that no possible change can take place in the meal. The flour is emptied from the sacks into a great hopper, carried thence by an endless chain of bucket elevators to the sifter, a huge wire gauze affair kept constantly revolving. From it the sifted flour is conveyed by another set of buckets to the top of the building, over the main mixing or dough room.

This room is on the second floor, and is 40x80 feet in size. It is the most remarkable room in the building. It is in the first place splendidly lighted. Next, it is insulated, like a refrigerator, every inch of floor, walls and ceiling lined with two inch thickness of cork, and the windows all fitted with triple glass, so that no current of air can penetrate, except as it is driven in through the ventilator.

Cost Just Ten Thousand Dollars.

At the far end of this great room is the wonderful ventilating machine, which cost Mr. Burns just \$10,000, and is only the fifteenth machine of the kind in the world to be installed. It is called the Gordon Process Air Conditioner and was invented

degrees, pumps into it enough moisture so that the humidity of the room is maintained at about 90 per cent, and distributes it through openings all over the room, at the same time sucking out the exhausted or de-oxygenated air. The temperature and humidity are regulated automatically, and they are also registered by clockwork, so that the slightest variation makes a permanent record which can be kept for a year if necessary. The temperature and the humidity of the air are tuned exactly right to make the conditions most favorable for rising and to prevent the crusting over of the dough by surface drying.

Measured and Weighed.

Returning now to our flour, which has been all this time suspended over the great mixing room; it is dropped down through a steel chute in the floor into the mixer. Everything, of course, is measured and weighed with the utmost precision—there is no guesswork about this bread. The mixer is turned by a thirty-horsepower motor and makes seventy revolutions a minute. This is only another way of giving the dough the

and others not enough of the yeast action, and a greater burden is thrown upon the stomach. The yeast produces first a decaying process, then a change of form or new growth, during which gas is generated, and, finding no escape, makes the dough swell up or "rise," and the more uniformly this action takes place, the lighter and more digestible is the bread, and the less danger of the dough souring or sagging.

When the flour and water have become sufficiently acquainted in this energetic mixer, the other ingredients are introduced; they are yeast, sugar, salt, lard, malt extract and milk. The entire time consumed for mixing all the ingredients is from seven to ten minutes. The dough is dropped into great troughs, which are on rollers and are moved up successively under the mixer, which is tipped up, allowing the contents to fall into the trough. Here the dough is allowed to remain for three and a half to five hours, while the oxidation, or fermentation, is completed, under the perfect conditions of light, heat and moisture.

Where Dough Starts.

Then the dough takes up its journey again. The trough is rolled up to a hole or trap in the floor, tipped up, and the contents pass by gravity to the room below, the great room facing on the street, whose windows we can imagine lined with eager and interested faces. Just below the trap is a machine called the scaling device, which measures off the dough into just the right amount to compose a loaf of bread. From this, by an endless belt, it is conveyed into the rounding up or kneading machine, where it gets some pretty rough treatment, but emerges in the shape of a perfect loaf, ready for the pan. Before being baked, however, it needs another little period of quiet and rest, so it is placed with its fellows in a tray or drawer and shut up in a great chest for an hour or so. Then it is finally moulded, put in pans, sent into the steam room for ten minutes, so that the outside will be thoroughly moistened to prevent crusting, and finally it goes into the huge oven, which will take 600 loaves at one time. There are three of these great ovens, and they, too, have been constructed with the most scrupulous care. They rest on a foundation of reinforced concrete thirty inches thick, and 100 tons of brick have been used in building them, the object being to insure absolute stability and absolute uniformity of heat. These ovens cost, as can readily be understood, \$2,000 apiece. The temperature at which they are maintained is 50 degrees. Incidentally it took about six weeks to heat them up the first time and, of course, they are never allowed to cool. When the dough is first put into the oven a jet of steam is turned in, which has the effect of driving the heat to the center of the loaf. The result is, both of this steam jet and of its perfecting moist condition of the outside of the loaf, that the baking begins in the middle of the loaf instead of on the outside. In other words, the baking proceeds from inside out, instead of from outside in, as is the case in the home-made loaf

baked in the ordinary gas or coal range. The brown crust is the very last stage of the baking instead of forming at the outset.

Finished Loaves Taken Out.

The finished loaves are then taken out, allowed to cool very slowly for about an hour, wrapped in paraffine paper, placed on wooden trays, which are slid into the enclosed delivery wagons ready for the consumer. The wagons stand inside the building, so that the bread is never exposed to the air. They are pushed in and out by hand, however, in order that no horses shall be brought inside the building. It has taken seven and a half or eight hours and eight different sets of machinery to produce a perfect loaf of bread.

This little sketch will show, without the necessity of special comment, how absolutely and perfectly clean and sanitary everything in this bakery connected with the manufacture of bread is; how the materials are practically never touched by hand, but pass from stage to stage by gravity or electricity; how the construction of the building almost hermetically

there is neither smoke nor ashes, nor the dust arising from stocking up with great quantities of coal. Thus even the air about the building is kept as clean as possible.

Comfortable rest and wash rooms have been provided for the employees, fitted with modern plumbing, including shower-baths for the men employed in the bake rooms. About fifty people are employed in the various departments. The bread superintendent is a high-salaried, trained and skilled man, whose preparation for the work is almost equivalent to a professional education. On him rests all the responsibility for the quality of the output and its uniformity. He has a laboratory and tests the flour, the dough and the other ingredients, and makes the necessary modifications in time, material and temperature.

This bakery also includes a pie department, which has some special features. The fruit or other mixture is prepared in great steam-jacketed copper pots. There is a very wonderful machine which rolls out the paste, cuts it into the right size, lays it on the pie-plate, holds it under the proper spout for the filler, lays

Blue-stem and Scotch Flie and Red Turkey wheat from Nebraska. He chooses the most glutinous or rubbery flour he can find, with the greatest elasticity of quality. But for pastry he goes all the way to the state of Washington and gets a flour grown there, with the least gluten and greatest proportion of starch possible. This makes a brittle or short dough, suitable only for pastry or crackers.

What becomes of the bread, after it is baked and shipped on the delivery wagons? It goes to the grocer and confectioner in Omaha, and is distributed also in South Omaha, Council Bluffs and outlying places within a ten or twelve-hour radius, which means, in some cases, 200 miles away. From the local grocer all that is not sold is taken back the next day.

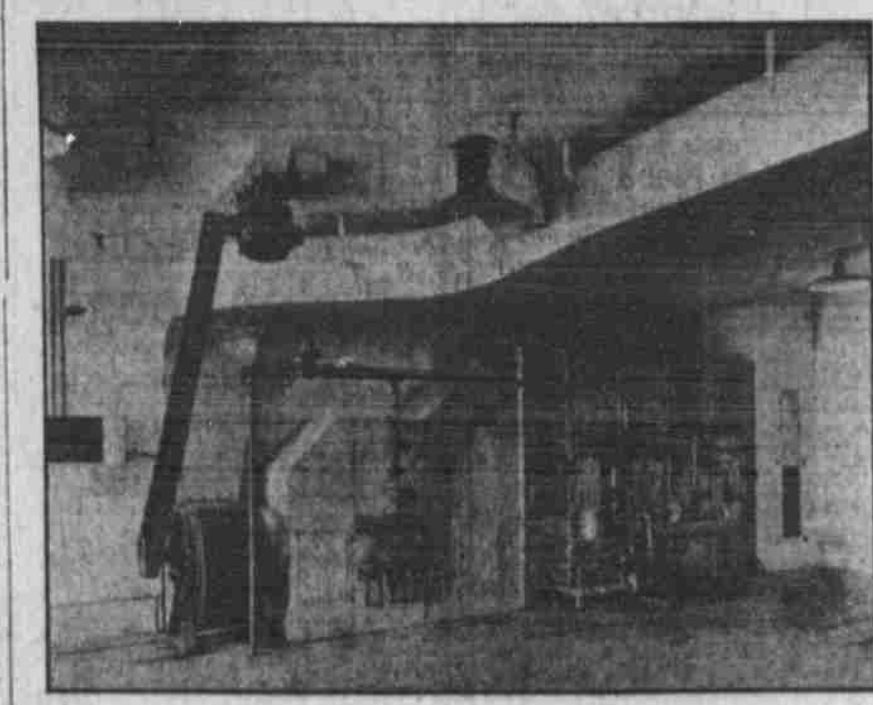
In the Retail Store.

In a corner of the bakery a retail store is fitted up, and here, besides fresh bread and pies, stale bread bread, so designated, will be sold for 3 cents a loaf. Anyone who will wrap it up and take it away. All that cannot be so disposed of is ground up and sold for chicken feed. Thus nothing is wasted.

Mr. Burns does not expect to compete with the other bakers of Omaha, and he wants that point made plain. He expects to compete with the woman who makes her own bread and thinks it is cheaper or better than the bread she buys. Mr. Burns believes his bread is better, because he can buy the very best material in the market; because it is made more scientifically; because it is more readily digestible and therefore more nutritive. He believes it is actually cheaper, because in computing cost the housewife does not take into consideration her own time or the fuel she uses and relatively cheaper, because in the long run the best is always the cheapest. He expects to carry on a campaign of education to prove his arguments, and it is for that reason that he will throw his bakery open to the public and have special demonstrations for the women of Omaha, so that they can see for themselves what they are getting when they buy a loaf of Burns' bread. If they learn nothing else, they will at least be satisfied, after spending an afternoon in this most fascinating building, that it would be impossible to imagine anything cleaner or more sanitary, and some of the legends about baker's bread will be forever dispelled.

Omaha Eats Baker's Bread.

Thirty-five per cent of the bread eaten in Omaha is baker's bread. Mr. Burns wants to raise this to 90 per cent. This, he believes, will be a great step toward the lightening of household drudgery and the attainment of co-operative housekeeping, the movement toward putting women's work on a modern, scientific basis. If Mr. Burns can convince the home bread makers that by buying his bread they can get a better and more nutritive article than they can make themselves, costing them actually less and saving their own strength and time for something more worthy, he will feel well repaid for his generous investment of capital, brains and energy, resulting in the establishment in Omaha of the most wisely planned, best built, most thoroughly and scientifically equipped and in every respect the most modern bakery in the country.



PERFECT VENTILATING SYSTEM.

by Jim Gordon of Detroit, who ten years ago was driving a delivery wagon at \$15 a week, and is now the head of the Gordon-Page Baking company of Detroit, with a daily output of 10,000 loaves of what is considered by bakers the best bread produced in America. This machine changes every cubic inch of air in the entire room every five minutes. It blows the air in from above the roof, carries it through a spray of water by which all the dust, smoke and pollen with which it may be mixed are washed away and the air left absolutely pure and clean; it then heats or cools it to the required temperature, which is 78 to 80

most severe beating possible, by means of which all the starch cells are burst open at the same time, so that the contents of these tiny cells may instantly be attacked by the fermenting properties of the yeast. This is just the point where bread made in a bakery—that is, in such a bakery as this one—has its greatest advantage over the home-made bread. The human mixer cannot use enough force to break open all these cells, and such of the work is left to the yeast, which attacks the envelope and eats into it gradually; thus the fermentation of home-made dough is a gradual process; some of the cells get a little too much



SANITARY WRAPPING ROOM.

seals it against dust, while only "selected air" is admitted. But the effort to obtain perfect cleanliness is carried still further. The walls for half their height are faced with white glazed tiles, and the rest of the height and the surface of the ceiling are of hard concrete. The floors slant a little, and are furnished with drains, so that ceiling, walls and floors can be washed with all the water desired, and that it will instantly drain off. There are no sharp corners between the walls and floor for dust to accumulate.

And finally, all heat is produced by crude oil, so that the boiler room is as clean as any part of the building, and

on the top crust and fills it. The oven differs from that for bread in that it revolves, and the reason for this is because some kinds of pie take longer to bake than others, and so as they pass the front of the oven they can be observed and taken out when ready.

A word about the flour. When a woman goes to the grocery store and buys a bag of flour, she will use it for bread, biscuit, cake, piecrust, thickening and for many other purposes indiscriminately. Not so the baker. He buys one kind of flour for bread and a very different kind for pastry. For this bread Mr. Burns buys spring wheat from Minnesota,