

OCEAN SENTINELS.

FACTS OF INTEREST ABOUT OUR LIGHTHOUSES.

Lights to Mark Shoals Supplies and Keepers' Deeds of Heroism.

Lightships are usually employed to mark shoals where the erection of light-houses is impracticable. Fifty of them guard dangerous points near the shores of ocean and lakes under Uncle Sam's jurisdiction. In addition to these there are eight spar light-ships, for purposes of relief. When a light-ship is reported off its station, a steamer is sent out to look for it and tow it back.

If it has disappeared altogether, another light-ship is dispatched at once to take its place. The territory covered by the Light-house Service is divided into sixteen districts, each of which is managed by one engineer officer of the army and one navy officer. While the former attends to all matters of construction and repair, the latter has charge of the running of the light-ships and light-houses, receiving telegraphic reports of anything that is wrong and having at his disposal a small steam vessel. Light-ships are more thickly distributed off Cape Cod than anywhere else. They are schooner-rigged, carrying one or two lights which are octuple lanterns with reflectors surrounding the masts and suspended from them. It costs \$8,000 a year to maintain a light-ship.

There are 750 lighthouses on the Atlantic and Gulf coasts, 130 on the Pacific shore and 280 on the great lakes. On rivers there are 1,600 "postlights" which are mere lanterns with lenses fixed to posts. They cost \$10 apiece and \$150 a year is required to maintain each of them. In this way many rivers are lighted like streets, the Mississippi, Hudson, and Ohio being actually illuminated from end to end. The main "depot" of the service is at Tompkinsville, Staten Island. There all supplies for the sixteen districts are bought and kept as well as spare lenses, fog signals, buoys, anchors, etc. Cans are manufactured there also for transporting the 260,000 gallons of oil consumed annually.

Formerly rapeseed oil, and then lard oil was employed, but kerosene is now used exclusively on account of its cheapness. At the same place all the lamps and fittings for light-ships are made as well as the tools for handling all kinds of lamps. One supply steamer of large size, provided with a search light so that it can go into port at night, distributes supplies among the light-houses and light-ships along the Atlantic and Gulf Coasts. These supplies include rations, with which keepers at isolated stations are provided.

Keepers are paid from \$700 to \$1,000 a year, the highest salaries being given to those who occupy isolated posts like Minot's Lodge, and those on the Florida Reefs. Each one of them has a book of 152 pages which tells him what to do in every emergency.

If his light goes out he is discharged, no matter what the excuse may be. Experts called "lampists" go from lighthouse to lighthouse continually, examining and repairing lamps. A first-order light consumes 2 1/2 gallons of oil in a long winter night. The oil is fed to it by clockwork, and the flash is controlled by similar mechanism.

An opaque pane in the cylinder of glass revolving about the light makes a dark interval, and a red pane produces a red flash. The lens of a first-order light is six feet in diameter, and the lamp has four concentric wicks, the biggest being four inches in diameter. One of the greatest of human inventions is the Fresnel lens, now used in all lighthouses, which condenses the light by an arrangement of compound refractors so as to throw all the rays in a single sheet. By its means a first order light, naturally of 450 candle-power, obtains a power of 12,000 candles.

The most celebrated of lighthouse keepers is Ida Lewis, who in deeds of heroism has surpassed the famous Grace Darling. She is now 50 years old and has charge of the Lime Rock Lighthouse at Newport. When she was 12 years of age her mother kept the light, her father being a helpless cripple. That was in 1854, and in September of that year she rescued four men from a capsized sail-boat. In midwinter of 1866-7 she saved a soldier of the Fort Adams garrison who had been similarly upset, and he was restored to life at the lighthouse.

In the fall of 1867 three men were swamped in their boat near Lime Rock while trying to pick up a valuable sheep that had fallen from a wharf. She saved them and the sheep also. Not long afterward she saw a man clinging to a spindle that marked a reef near the lighthouse. In a gale in March, 1869, she rescued two more soldiers from a swamped boat. On February 4, 1880, two members of the Fort Adams garrison band broke through the ice between the lighthouse and the fort, and she pulled them out. Thus far she has saved thirteen persons from drowning.

Many a deed of heroism is performed by the light-keepers in Uncle Sam's employ. Scores of people have been saved from wrecks by the hardy mariners of the New South Shoal lightship, who never hesitate to launch a boat in the midst of the most violent storm for the purpose of a rescue. On one occasion twenty-seven persons were snatched by them from a watery grave, when the City of Newcastle ran upon the Nantucket banks and sank stern foremost. On another day they caught sight of a black object driven before the gale, and putting forth in pursuit of it, rescued a man on a raft, whom they found seated upon the corpse of a fellow-castaway, his head buried in his hands, and hopeless of the aid which came at last.

In February, 1881, the Sharp's Island

lighthouse was carried away by ice in Chesapeake Bay. The keepers spotted the light to the last, and clung to the structure when it was swept from its foundation, finally saving, not only themselves, but a great part of the valuable apparatus.

Some of the devices employed by the Lighthouse Board are regarded by residents on shore as extremely objectionable. Worst of all are the "steam sirens," which are truly a diabolical invention from any other point of view than that of utility. They utter a series of unearthly whoops, which ascend the scale notes by note until the unwilling listener feels as if, in case they should go a few notes higher, he would become suddenly insane. Nearly as bad are the "whistling buoys," the establishment of one of which near any inhabited spot is sure to excite most frantic protests from dwellers in the neighborhood.

Sixty-two of these buoys are employed in the service, the biggest of them costing \$1,075 each, and being audible at a distance of fifteen miles. The sounds they utter are inexpressibly mournful and saddening. They consist of an iron pear-shaped bulb, with a tube running through the middle and extending thirty two feet downward into the water. At the upper end of the tube is adjusted a locomotive whistle, through which the air, automatically compressed by the motion of the waves, is liberated in horrible toots. Buoys of this description are particularly useful in foggy waters.

The first lighthouse built on this continent was at St. Augustine, Florida. Its chief use was as a look-out, whence the Spanish people of the town could see vessels approaching from Spain, or get notice of the coming of foes in time to run away. The tower attracted the attention of Francis Drake as he was sailing along the coast with his fleet of high-pooped ships, on his way home from pillaging the cities of the Spanish main. So he stopped long enough to loot the town and destroy what he could not take away. In 1880 the ancient structure of Coquina Rock, which the United States had adopted for a lighthouse, fell down, but before that happened another one had been constructed.

Fire-towers at the entrance to ports were established in the earliest historic times. Bonfires were built on top of them at night. The most famous light-house of antiquity stood on the island of Pharos, off the city of Alexandria, in Egypt. It was one of the seven wonders of the world, and was put up during the reign of Ptolemy Philadelphus. After standing for 1600 years it was destroyed by an earthquake. It is said to have been over 500 feet high.

MEDICAL LAKE.

Cures the Maladies of Men and Animals.

The story of the peculiar discovery of Medical Lake in the State of Washington has been told by Dr. John W. Semple, Superintendent of the Washington State Insane Asylum. According to the doctor the curative qualities of the water of this lake are not only appreciated by men, but by beasts as well; in fact it was through the instinct of a flock of sheep that it was discovered that the waters had wonderful medicinal qualities. Many, many years ago, so the doctor's story goes, "when the Indians who inhabited the region about the lake were first aware that the white men were taking from them their hunting grounds, and destroying their happy villages, they gathered all their forces about a small lake and prevented by all means possible the advent of the whites on its shores. It appeared that the Indians held the waters as sacred and created expressly for them and not for their pale-faced brothers. One venturesome settler finally succeeded in exploring the lake, and found that it contained no fish and could not be adapted for any particular use by the whites. The settlers then ceased all efforts to use the lake, supposing that the vigilance of the Indians was caused by a superstition peculiar to their race.

Many years after, when the Indians had decreased in numbers the real qualities of the water were learned, and old settler named Lefevre owned a flock of sheep which was afflicted with a malady which threatened its destruction. The sheep bathed in the lake and their disease disappeared. Lefevre was afflicted with rheumatism and decided to try the water for his malady. After the first bath he felt relieved and the prosecution of the bathing brought permanent improvement. The wonderful discovery was soon known about the neighborhood, and children and pigs, men, women and cows were brought to medical lake to bathe in its health-giving water. But it has not been until recently that any attempt has been made to exploit its curative powers to the world. The water certainly has properties that relieve a person afflicted with rheumatism.

"One of the peculiar things about the lake is that no fish can live in the water with the exception of a species called the oxotoli, which has inhabited the lake since the discovery of the lake by white men. This species is probably a hybrid between a land and water animal. It has a head like a frog, a body similar to that of a catfish, and moves by means of legs. It inhabits both the water and the shores of the lake. This fish at maturity weighs about fifty pounds."

A Pet Persian Horse.

"Persian horses," says Mrs. Bishop, in "Journeys in Persia and Kurdistan," "are to be admired and liked. Their beauty is a source of constant enjoyment, and they are almost invariably gentle and docile. It is in vain to form any resolution against making a pet of one of them."

"My new acquisition, 'Boy,' insists on being petted, and his enticing ways are irresistible. He is always tethered in

front of my tent, with a rope long enough to give him considerable liberty, and he took advantage of it the very first day to come into the tent and make it appear that he wanted me to divide a melon with him.

"Grapes were his preference, then came cucumber, bread and biscuit. Finally, he drank milk out of a soup plate.

"He comes up to me and puts down his head to have his ears rubbed, and if I do not attend to him at once, or if I cease attending to him, he gives me a gentle but admonitory thump.

"I dine outside the tent, and he is tied to my chair and waits with wonderful patience for the odds and ends, only occasionally rubbing his soft nose against my face to remind me that he is there. A friendly scuffle is the only sound he makes. He does not know how to fight or that teeth and heels are for any other uses than eating and walking. He is really the gentlest and most docile of his race. The point at which he draws the line is being led; then he drags back and a mulish look comes into his sweet eyes. But he follows like a dog, and when I walk he is always with me.

"He comes when I call him, stops when I do, accompanies me when I leave the road in search of flowers, and usually puts his head either on my shoulder or under my arm. To him I am an embodiment of melons, cucumbers, grapes, pears, peaches, biscuits and sugar, with a good deal of petting and ear-rubbing thrown in."

RELIABLE RECIPES.

Egg Rolls.—One pint of sweet milk, two eggs, one-half teaspoonful of salt, one and one-half pints of flour. Bake in gem pans.

Corn Starch Lemon Cake.—One piece of butter, size of an egg, mixed with one cup of sugar. Stir one egg in and the yolk of another, add one cup of flour, grate in the rind of one lemon, add one-half cup of sweet milk, one teaspoonful of cream of tartar, and one-half of soda. Use the remaining white of egg for frosting.

Quick Pudding. Set a quart of milk to cook on the stove, and when it boils stir in flour smoothly until it becomes quite thick. Make sauce for this pudding by creaming together a piece of butter the size of a walnut and one heaping tablespoonful of sugar. Then pour on a pint of milk. Let it boil for ten minutes.

Rolls. Take a piece of dough about the size of a loaf of bread, add to it one egg, two table-spoonfuls of brown sugar, three quarters of a cup of butter, and about half a cup of flour. A little soda may be added if it is a little sour. Mold well, and let it rise before making into biscuits. Let them rise again, and then bake in a moderate oven.

Strange Companionship.

A notable instance of this oddity came under the writer's notice once upon a time on a ranch that was largely devoted to stock-raising. Cattle, horses and hogs were kept in large numbers and allowed to run at will upon the range. One day in riding over the meso-gan oddly assorted trio was found in a locality at a considerable distance from any other animals. This trio was made up of a cow, a horse and a pig, and all three were feeding side by side in the most amicable manner. At first it was thought to be nothing more than a coincidence that the three members of different families should happen to be together, but subsequently it turned out that this trio had evidently set up an alliance offensive and defensive against the other animals on the range. They were always together. It was a comical sight to see the oddly assorted trio traveling over the range. The horse usually took the lead, with the cow next and the pig last of all. Occasionally the horse looked around to see if his porkship were keeping up, and if he fell behind a halt would be made to allow him to come closer. When feeding the pig was just as apt to put his snout down by the horse's or cow's mouth and endeavor to snatch the grass from between their teeth as to graze on his own hook. One could almost see in the countenances of the large animals a sort of half humorous, patronizing air as they regarded their diminutive companion, while the pig on the other hand walked with a bullying swagger and a self-confident air, for all the world like the youngster who trots along by the side of his "big brother," in the full assurance that all his battles will be fought for him. [San Francisco Chronicle.]

WIT AND HUMOR.

A little nonsense now and then, is relished by the wisest men.

His objection.—"Why don't you come to America, Fritz, where one man is as good as another?"

"Yah, vere one man is so good as another and von woman was as good as another, both of dem. Guess I stay home." [Indianapolis Journal.]

"The trouble with Tompy is that he is shallow."

"Tompy? Nonsense. If you had ever tried to fill Tompy with champagne you'd have changed your mind about that."

Mrs. Trotter to Mrs. Barlow—"Since the first of the year my dear husband has surnamed over a new leaf. He walks down town every morning now to save car fare."

Trotter to Barlow—"Hello, old man! You ought to try my scheme of walking down town every day. It gives you a chance to smoke two cigars before you get to the office."

Foot and mouth disease has appeared in Holland

FOR THE LADIES.

PRETTY FIGURES.

There is always something new in fashion. One of the prettiest of the late arrivals is made of the old wash blonde used without lace or ribbon. It is bordered with a wide flounce of narrow plaiting. The chicken feather trimming on the Marie Antoinette hebus, as described in the Autumn, was so pretty that it is again placed on colored crepe, which is this time in long, straight scarfs. Akin to the hebus are the colarettes and shoulder capes, of so many combinations of lace, ribbon, chiffon and mousseline de soie that only a milliner could have thought of half of them. [Boston Cultivator.]

SUSPENDERS AND BUTTONS.

A queer article of feminine wearing apparel has made its appearance on Broadway, New York. In general appearance it resembles the masculine suspender, but the initiated say this is an optical illusion. At all events, it is the most elaborate harness that has made its appearance since the Easter bonnets with fishing tackle attachments. A broad belt of gold braid is worn about the waist, to which is sewn seven gold buttons corresponding to the waistbands of a man's trousers. The suspenders are also of gold braid, three inches wide and fitted with gold buckles. The idea originated with a society belle who suggested that the costume might be gotten up in part by subscription. She intimated to her gentlemen friends that it would be the proper thing for them to each buy a gold button and have their respective monograms engraved thereon. She has cleared a small fortune already, it is said, in surplus buttons. [St. Louis Republic.]

SILK LININGS.

The newest fad in silk dresses is silk lining of contrasting color. This is used so as to give the effect of a two-toned silk, which will speedily be manufactured in the single substance. Fashionable women are not satisfied with the silk skirt. They want a more substantial lining for their handsome dresses, and one that they will not be ashamed to show in the trained skirt. It is quite a change from the modest cambric shawl that a search for a pocket used to reveal, but somehow it has come about. A brown, satin finished silk, lined with a satin finished orange silk, had the narrow ruffles on the skirt bound with the orange silk. It was also used on the bodice and at a first glance one was under the impression that the outside of the dress. Fortunately taste does not all run in one channel, so the woman with a moderate purse can still live her dress with cambric and webby but herself and her dressmaker be the best. [Boston Free Press.]

SPRING SETS.

Cousin Madge writes in London Truth: Glossy cloth is the most fashionable material, but rough surfaces are quite as fashionable as ever, while serges and tweeds will be largely worn. Perhaps the best way of assisting you to choose is to describe some of the spring novelities. One was a skirt of dark blue serge, with a seam down the front, bordered with an inch wide band of jet, dividing into two somewhere about the knee, and leaving a small interval between. The jet formed a point up the front of the bodice over full-plush velvet of the palest green. A similar point appeared to bring up the skirt over the bodice at the back. The plush velvet sleeves were full above the elbows, but tight and covered with jet below them. The high collar was trimmed with bands of jet, and the skirt was bordered with the same. I have called the material of the bodice "plush velvet" because I know no better name. It looked like a mixture of the two, being very soft and shiny.

MODERN COIFFURES.

The increasing desire to rise above law and rule is noticeable not only in dress and its accessories, but in the matter of the coiffure. Few women dress their hair nowadays to suit the features of their friends and neighbors, but in accordance with their own particular cast of countenance. As a result there is a pleasing medley of styles to be seen, and no one fashion appears to take the lead. The compactly braided coil just at the back of the head is popular with those who prefer the trim princess bonnet. There are high-rolled coiffures in Pompadour style, with glittering gem-set pins thrust in here and there, low, broad Russian coiffures accompanying the full short bang over the forehead. Greek roots with classic fillets of gold or silver to bind down the waves of hair—a special style seldom to be ventured upon—tresses parted at the immediate back of the head, waved on the left side, braided in one broad strand on the right, and then looped low a la chateleine at the nape of the neck. There is also the "Naomi" style, in which a length of abundant hair is loosely twisted and carried around the head like a fluffy aureole. [St. Louis Republic.]

FASHION NOTES.

Pink azaleas appear on a background of water green.

Fruity velvets with cream lace are used as trimmings on house gowns.

White faille and burnt rose silk crepe are used as complements.

The English cricket cap of cloth has come to us as headgear for our women tennis players.

Fashionable footwear for women will

run to the Oxford tie, which has been quite elaborate.

Art needle work is to play a prominent part in the ornamentation of summer dresses.

One of the prettiest of the new arrivals for young ladies is the Alpine in straw, with cock's feathers at the top.

The new Japanese parasols for lawn come with "extension handles." They are a great improvement on the old style.

It is to be wondered if the milliners are to blame, or the wearers, for the harmonious blending of flowers of the new hats.

Those new electric blue lace veils to the wearers anything but an improvement, and cannot be commended.

Some very elegant picture hats have with short, full ostrich plumes have made their appearance among other elegant fancies in Parisian millinery.

A very lovely tint of "rose-heart" appears among the list of new colors. It is a fascinating shade, more exquisite than the pale English rose shade of last winter.

Some stylish black silk capes and modeling cloaks are shown. A "Hungarian" model, reaching from neck to skirt, is made of black bengaline and lined with black and white checked silk.

Yokes and yoke effects on every gown, for hot weather uses, are multiplying, and these take on all sorts of shapes, pointed, pleated, square, heart shape and scalloped. A novel yoke shows a pointed yoke, the immediate center of which extends to the waist front and terminates in the middle of the back.

English bridesmaids are wearing sheath skirt and coat costumes of pale rose-yellow tulle over yellow satin, with deep-rolling collars of green velvet, soft vests of yellow crepe de Chine crossed and re-crossed with orange ribbons, which fasten at the left of the belt with many loops and ends of the same. The gloves, stockings and shoes are of pale yellow, and the narrow braided satin coats are lined with white silk.

Fashions are liable to an infinite number of variations, but there is a gratifying prospect of no radical change for some time to come. The styles now in vogue are likely to remain, and those who are looking for great changes will be disappointed. Skirts are still plain and trimmed at the extreme edge. Dress dresses are becoming more practical and varied in style. Open jackets and blouse waists are not out of fashion, and will remain in favor.

Heroic Ida Lewis.

The most celebrated of lighthouse keepers is Ida Lewis, who in deeds of heroism has surpassed the famous Grace Darling. She is now fifty years old and has charge of the Lime Rock lighthouse at Newport, R. I. When she was twelve years of age her mother kept the light, her father being a helpless cripple. That was in 1854, and in September of that year she rescued four men from a capsized sail-boat. In midwinter of 1866-7 she saved a soldier of the Fort Adams garrison who had been similarly upset, and he was restored to life at the lighthouse. In the fall of 1867 three men were swamped in their boat near Lime Rock while trying to pick up a valuable sheep that had fallen from a wharf. She saved them and the sheep also. Not long afterward she saw a man clinging to a spindle that marked a reef near the lighthouse, rowed out to him, and got him safely. In a gale in March, 1869, she rescued two more soldiers from a swamped boat. On February 4, 1880, two members of the Fort Adams garrison band broke through the ice between the lighthouse and the fort, and she pulled them out. Thus far she has saved thirteen persons from drowning. [Boston Transcript.]

Photographing Under Water.

It is quite possible to take photographs under water. In 1883 a submarine observatory was constructed by Signor Tozzelli at Naples, enabling visitors to see the bottom of the sea. It was a steel chamber, with plate glass floors and a collapsible float to sink it to different depths. It carried eight persons, and while telegraphed inside by electric light, while telegraphed outside by the shore. It was of course, quite possible to take photographs inside it beneath the water.

Photographing under water has been usually carried out. Experiments were made in 1889 in the Mediterranean to see how far daylight penetrated under water. In very clear water near Corsica, and eighteen miles from land, the limit of daylight was found by means of photographic plates to be 1,350 feet. [Spare Moments.]

Death of the Smallest Woman.

Miss Rose Amick, a midget, known in the museum world as Rose Leckie, died recently in Newmarket, Clark County, Ind. Her height was less than three feet and her weight only forty-five pounds. She was advertised as the smallest woman in the world. She was the daughter of Mr. and Mrs. Joe Amick, both of whom are portly. Miss Amick's life was spent in traveling and freak. Barnum discovered her, and with his show she traveled over the country, Canada and Europe. The next year she was exhibited in several seasons exhibited herself.

Defective sight.—"You see anything wrong?" "No, Lieutenant."

"You see anything wrong yet?" "Lieutenant."

"Wretched as, can't you see that your helmet hides before your head?" [Texas State.]

THE JOKER'S BUDGET.

AND YARNS BY FUNNY MEN OF THE PRESS.

ed Them Terrible Not Expert—Ever Memorable Day—Had to Give

IT THIED THEM. find it restful to talk a good deal writing," said the rising young au-

rests you, "does it?" said the old paper man. "does very much, indeed," said that curious, now."

"Why?" "Because it has precisely the opposite effect on those who listen to you." [New Press.]

BRONSON FORGOTFUL AS EVER? "I am so. Why that fellow has to himself up in the directory every before he goes home from business. Forgets his address." [Bazar.]

NOT EXPERT. had to be away from school, yesterday said Tommy. "You must bring me an excuse," said teacher. "Who from?" "Your father."

"He ain't no good at making excuses; makes him every time."

AN EVER MEMORABLE DAY. "Do you know what day this is university of?" "Well, I should say I did. I thought you would."

"Humph! Who could forget the day your own house was burned?" "Yes, George!"

"What?" "It's the day you proposed to me!" "Life."

HAD TO GIVE IT UP. "What is your husband doing now?" "Nothing!" "I heard that he was going the business of making rain."

"Yes, but he couldn't raise the wind." [New York Press.]

HOW SHE PUT IT. "Yes, indeed," said Miss Bleeker, early bird catches the worm.

"I'd like to see an incontinentible" said Miss Emerson, of Boston, the self-proclaimed "queen" of the gaudy and grotesque.

UNDEARABLE. "What did your sister when you told her I was here in the city waiting for her?" "Nobin."

"But she took a ring in the finger and put it on another." [New York Herald.]

THE USUAL WAY. "One little good night kiss," he said, "before he wandered home."

"I got enough kisses to last ahead a couple of years to come." [New York Herald.]

WONDERMENT. "He proposed to you just before getting married?" "Yes. Poor fellow; I rejected."

"Well, why in the world did he do that?" "He proposed to you just before getting married?" "Yes. Poor fellow; I rejected."

HOW IT IS DONE. "Paw, when a man commits suicide does he shoot his head?" "Fig.—No; merely his mouth." [St. Louis Journal.]

UNNECESSARY EVIDENCE. "You needn't tell me that dogs know as much as human beings. I know to church with me last Sunday."

"Yes?" "Well, sir; he slept through the sermon." [Life.]

A FEMINE PARADOX. "The waist of Evelina's gown is somewhat paradoxical; it cost a hundred dollars down, and yet it is illogical."

Although it has a perfect fit upon her form ethereal, she is justified in calling it a waist of good material." [Life.]

DIABOLICAL. "Do tell me, what did he do when you proposed to him?" "That he'd be a brother to me."

"Dear me, what a lot of in-law he has."

WHY THEY WOULDN'T MARRY. "Goldburg—I wouldn't marry you, you were as rich as Crassus."

"Harlow—Well, that's just the way; I wouldn't marry you if you were as rich as Crassus." [Boston Post.]

DEFECTIVE SIGHT. "You see anything wrong?" "No, Lieutenant."

"You see anything wrong yet?" "Lieutenant."