ORGANIC EVOLUTION.

How Nature Changes Her Plans to Meet New Conditions.

In the course of organic evolution very many strange and quaint developments present themselves from time to time, not only in the history of a race or genus, but within the narrow compass of the life of a single individual member of such race or genus. Nature changes her plans, in fact, to meet contingencies that occur unexpectedly. Probably few who have any acquaintance with marine fish have failed to notice something strange about the appearance of what are called flatfish, known as the flounder family (or in zoology as pleuronectidae), embracing the turbot, plaice, brill, sole, halibut, flounder, dab, etc. The conformation of the head and of the anterior portion of the body in the adult stage is characterized by a strained and unsymmetrical appearance. In this respect the flatfish differ from all other members of their zoological class.

The question naturally suggests itself why this particular genus should be so different from all other fish, which, as a rule, are remarkable for their symmetrical and graceful appearance. And the answer is very simple. The flatfish, instead of swimming in an upright or vertical position, like all other fish, has for some reason or another taken to the unnatural habit of swimming on its side. It may be on either side—right or left. This enables it to take up what appears to be the lazy position of lying flat on the bottom of the sea, where it can move about freely in search of such food as small marine animals, mollusks, worms, etc. The young fish swims erect in the ordinary manner for some time, but it early shows a tendency to become lopsided and gradually falls over on one side, usually the left, but not invariably so by any means.

The eye on the under side, just so soon as the tendency is shown to fall over on that side, commences gradually to move round to the other or uppermost side and finally takes its place beside the other eye.

This process is strangely brought about through the twisting of a portion of the bones of the head, which gives the latter a decidedly deformed and unnatural appearance. The ventral fins become useless and degenerate. Unpaired fins are developed, the undulatory motion of which enables the fish to swim with ease and even rapidly in the new and horizontal position assumed.—Harper's Weekly.

First Encyclopedia.

The most ancient attempt at what is called in these days an "encyclopedia" was Pliny's "Natural History." This old work, a very high authority throughout the middle ages, is really a remarkable production and well deserves the fame that for so many ages belonged to it. Pliny, who died in 79 A. D., was not a naturalist, a physician or an artist and did not pretend to be the wisest man of his time, yet such was his interest in knowledge that he devoted the leisure hours of a busy public life to compiling the work which did a vast amount of good in the world and paved the way for the comprehensive encyclopedias of the present time.—New York American.

One Woman's Way.

Husband—Why are you buying such an expensive present for Mrs. Shoddy? I thought you told me you hated her.

Wife—So I do, but I know she can't afford to give me a return one as handsome, and it will make her perfectly furious.—Baltimore American.

COMEDY IN COURT.

Trick by Which a French Lawyer Won a Hopeless Murder Case.

Maitre Lachand, the famous advocate, was perhaps the greatest master of comedy in France, and not a few eminent actors envied him his marvelous powers of mimicry. He was once employed to defend a murderer, against whom the facts were hopelessly clear.

When his pathetic appeals and his tears—which were always at call when he pleaded before a country jury—failed to touch his stolid audience, he resorted to a most impudent piece of trickery. Thrusting his moistened white handkerchief into his pocket, he demanded if the jurors were men, if they had human hearts, if they could bring themselves to condemn a fellow man like the accused, whom he had credited with all sorts of chivalrous if not saintly merits.

His eloquence was not merely fruitless, but the jury responded to it at first with uneasy shuffling, then with biting lips, and finally with loud and uncontrolled bursts of laughter. Lachand, while flinging about his hands, had intentionally dipped his fingers into the great inkpot in front of him, and as he drew his right hand across his forehead, as if in agony of despair at the certain fate of the accused, he left upon his brow an enormous black mark like a crescent moon and drew two other black traces down his cheeks as he put his fingers to his eyes to dash away the tears.

Feigning high moral indignation at their conduct, he continued: "You are about to decide whether one of your fellow men shall be thrust by you out of the ranks of the living, and you choose such a moment for indulging in cruel and thoughtless laughter. Is this extravagant mirth a fitting mood in which to decide whether a man shall or shall not die?"

The argument actually told upon the jury. The man was acquitted.—Paris Journal.

Long Beards.

Howell's "Welsh Celebrities" says: "Llewenn had the longest beard of which we have record. When loose and flowing it fell down over his horse's shoulders almost to the animal's knees. It was of a peculiar yellow or straw color, which was all the more curious, both his parents being dark haired mountain Welsh people. Years afterward the mountain people had proverbs which referred to this freak, they often using the expression 'About as long as Howland's beard' or 'Yellow as the whiskers of Llewenn.'"

George Kilingworth, whom Queen Mary sent to Russia in 1555 as one of her agents to Czar Ivan the Terrible, had a beard five feet three inches in length, and Count Ruloff of Poland, 1697, rejoiced in the possession of a mustache which was so long that he could not touch the ends of it with his fingers.

The Price of Reform.

When the circus was in town the other day an inquisitive visitor interviewed the manager of the sideshow.

"You used to have a very remarkable glass eater," began the noisy one. "Is it possible that you have discharged him?"

"Alas, yes," was the answer. "If you remember him you will recall that he used to eat beer bottles. Well, a few months ago a temperance orator got hold of him and made him sign the pledge. After that he refused to eat anything but mineral water bottles, and they were too expensive. So he had to go. Too bad. He was one of our best attractions."—St. Louis Times.

HEAT OF THE SUN.

The Theory That It Is the Result of Contraction.

Many theories regarding the source of the sun's heat have been formulated by scientists at different times. One was that as the sun was the largest heavenly body in the solar system it attracted smaller bodies to it in great numbers and that the force of these on impact caused enough heat to make the sun glow. When it was figured out how much would have to drop on it every day the amount was so enormous that the theory was laughed out of existence. There is no doubt, though, that thousands of smaller bodies are constantly falling into the sun and producing heat.

Another was that the sun consisted of a huge mass of burning gas. Now, the character of a great many of the substances found in the sun is known, and it is also known that all of them are in a gaseous state on account of the intense heat, but when it came to figuring out all the greatest possible quantities of substances necessary to combine and produce heat it was found that the sun would be entirely consumed in less time than we already know it to have been in existence.

How, then, does the sun maintain its heat? The theory now held by scientists is what is called the contraction theory. That is that the sun is slowly cooling and therefore contracting and that the enormous pressure produced on the inner mass by this contraction causes it to become white hot and give out heat and light. There is no serious palpable objection to this theory. On the other hand, it fits in with all the observed phenomena of the sun. Therefore it must stand until fully disproved or a more likely theory is offered. Likewise this theory is in accord with common sense. We all know that pressure produces heat, and we know that a hot body in space radiates its heat and tends to contract, and we know that contraction produces pressure, so there you are.

Not many people have any idea as to the enormous amount of heat that the sun sends off into space. Our earth gets only a very small part of it. The head of a pin placed twenty feet away from an electric light gets in proportion to the light on the surrounding walls of a room about what the earth gets of the sun's light and heat radiated into space.

Why does not the earth lose its heat as fast as it gets it, as the moon does? Because the earth has an atmosphere and the moon hasn't. This atmosphere allows light waves to go through it to the earth, but when the earth changes them to heat waves the atmosphere will not let them out, except very slowly. Thus our heat is kept through the night.

All are familiar with this property from the common hothouse. The glass allows the light waves to come in and be changed to heat waves, but it will not let the heat waves go out. Thus the inside of such a place is much warmer than the outside air.—Lawrence Hodges in New York Tribune.

Her Name Not Polly Ticks.

During a political campaign a candidate for the legislature was driving through the country seeking votes among the farmers when he met a young man in farmer's garb walking by the roadside.

Having in his mind a prospective vote, he stopped his horse and, saluting him in a familiar manner, inquired:

"Are you paying any attention to politics nowadays?"

The young man stopped, looked at him suspiciously and drawled out:

"No, stranger; that don't happen to be my gal's name, but ef it was I wouldn't think it was any of your darned business."

This ended the interview as well as the prospect.—Judge.

Keeping His Promises.

Mrs. Synnex—When Tom asked me to have him he promised me that my lightest wish would always be law with him.

Mrs. Sauer—And of course that was all the promise amounted to—merely empty words?

Mrs. Synnex—No, I won't say that. Tom always respects my lightest wishes. It is in matters of importance where he is bound to have his own way.—Boston Transcript.

Absentminded.

An English paper says that the champion absentminded man lives at Belham. On one occasion he called upon his old friend, the family physician. After a chat of a couple of hours the doctor saw him to the door and bade him good night, saying: "Come again. Family all well, I suppose?" "My heavens!" exclaimed the absentminded beggar. "That reminds me of my errand. My wife is in a fit!"

TEST BY PHOTOGRAPHER.

He Discovers That In Some Ways the Whole World Is Kin.

"You note," said the photographer, "that in pictures taken anywhere, in any part of the globe, the humans face the camera as if they wanted to be taken. It may be vanity, but they all seem to like to get into the picture.

"Take a group picture made anywhere, say among your own tribe. Note the people in the rear with necks craned to get out from behind blanketing people in front, so that their faces will show. Shyness or modesty may keep some who are in the background from doing this, but unless the photographer has personally posed every member of the group so that he will show you will always find in such pictures some figures of persons who would otherwise been more or less obscured, but who have so disposed themselves as to make sure that their faces show.

"So of any set group, and the same would be true of any sort of picture in which many persons were taken, as at a banquet or a wedding. People like to get into the picture.

"Just how true this is appears in many ways in all sorts of pictures—in pictures in which people are not the main but only incidental or subordinate features, as of accidents or ruins or scenes of a great variety of sorts. In such pictures where the presence of the camera was known you will always find some persons facing or turning toward the photographer, with an evident desire to get into the picture, and it is easy to imagine that the gratification of seeing themselves there may give them pleasure.

"Look at pictures taken of semisavage or semicivilized people in remotest countries, where perhaps they had never seen a mirror or heard of a camera, but you may be sure that human vanity exists as it does with us, and you may see somebody trying to get into the picture or smiling to look well in it.

"Seriously, this pleases me as no other one minor thing that I know of does. It brings the whole world closer together, for it shows that however far apart in land and tongue and customs the races of the world may be, yet in some at least of man's underlying human traits we are all kin."—New York Sun.

A Good Name.

After the civil war many offers of places of honor and fame came to General Robert E. Lee. He refused them all, says Thomas Nelson Page, in his biography of the soldier. The only position which he finally did accept was the presidency of Washington college, with a small salary.

On one of these occasions Lee was approached with the tender of the presidency of an insurance company at a salary of $50,000 a year. He declined it, saying that it was work with which he was not familiar.

"But, general," said the representative of the insurance company, "you will not be expected to do any work. What we wish is the use of your name."

"Do you not think," said General Lee, "that if my name is worth $50,000 a year I ought to be very careful about taking care of it?"

Fresh Water Springs In Midocean.

Several fresh water fountains are known to exist in the gulf of Mexico, where vessels have frequently filled their casks with ice cold sweet water that comes up like a geyser in the midst of the salt water. The fresh water springs, as the sailors call them, have been known in the gulf for 200 or 300 years. They were discovered by early voyagers and were the salvation of many a mariner whose supply of fresh water ran short while he was becalmed in the doldrums. Some of the fresh water springs are marked upon the charts, but there is little need of them nowadays.

Two Opinions.

"What is your impression of Wilkins?" we asked a lawyer the other day.

"Do you want my professional opinion or my opinion in a friendly way?" was the reply.

"Well, professional."

"He's a silly ass!"

"And your friendly opinion?"

"He's another silly ass!"

"Well, what's the difference?"

"Why, I charge only for the first."—London Scraps.

Waiting For Himself.

On leaving his lecture room one day an absentminded professor pinned a notice on the door to the effect that he would be back at 4 o'clock. Returning some time earlier than he had expected he was attracted by the notice. He read it thoughtfully, looked at his watch, and, seeing that the professor would not be in for fully ten minutes yet, sighed and turned away to kill the time till he himself would return.—Bohemian.

Animal Mud Bathers.

Among birds the salt water species often seek fresh water to wash in. Different land birds choose different earths in which to dust and also wash in water, and nearly every tropical animal, including the tiger, bathes either in water or mud. Perhaps the best known mud bathers are the wild boar, the water buffalo and the elephant. The latter has an inexpensive advantage over all the other animals in the use of its trunk for dressing wounds. It is at once a syringe, a powdering puff and a hand. Water, mud and dust are the main appliances used, though it sometimes covers a sun scorched back with grass or leaves.

An Early Railroad.

An old inventory of the Mohawk and Hudson railroad, now a part of the New York Central and Hudson River railroad, dated Jan. 1, 1833, gives the following as the total rolling stock of the road at that time: Three locomotives (the John Bull, the De Witt Clinton and the Experiment), three carriages, accommodating twelve passengers each; nine, accommodating nine each; two, accommodating six each, and three, accommodating eighteen each, a total capacity of 183.

A Habit That Pleased.

"So you have thought it over carefully and decided that young Moneyblower is the man you must marry?" said her father gravely.

"Yes, father," the young woman replied.

"Are you sure that his habits are such as will make for a happy married life?"

"Yes, indeed. He buys a new motorcar every year, and that's just the sort of habit I want my husband to have."—Detroit Free Press.