

CHAPTER X

THE BATTLE AGAINST DISEASE

ALL along I have made reference to the climate of the Isthmus, its evil reputation, the toll of lives, and how now, through the agency of strict sanitation, it is no longer unhealthy. The manner in which a region reeking with pestilence has been made habitable furnishes one of the romances of Panama.

When the Americans first took charge, 452 lb. of quinine a month were taken by the people in the Zone to keep off fever. Indeed, the dispensaries distributed in thirty days a million and a half of two-grain capsules. To-day (1913) not one-tenth of that amount is required, and the general health is much better than then.

During the first year of the American occupation the death rate was two per hundred; during 1912 it was one per hundred. It has been costing the United States £250,000 a year, and the constant employment of 1,500 men, to keep Panama free from the ravages of disease.

So whilst one gang of men has been working to build the Canal, another gang does nothing but

attend to the health of the workers. The great hospital at Ancon was built by the French, and there was brought to bear the latest medical knowledge in curing those who fell sick. The Americans have done much better than that. They have directed their main energies to preventive agencies, so that the men shall not fall sick.

Yellow fever used to rage, horrible and sudden, and strong men quaked at the way their friends went down. For the last few years there has not been an outbreak of yellow fever in the Isthmus. And the old days—what awful times! In the cemetery at Colon there are more men lying dead from yellow fever than there are live men walking the streets.

One of these days an American writer will be visiting Egypt and India, and he will write home enthusiastically that the English are copying the ways of the Americans in Panama, and are tracking down the fever-carrying mosquito which is the villain of the piece. He will mean well, but he will be inaccurate. As a matter of historical correctness, it is the Americans who are copying the English, and doing the work with a thoroughness which is certainly not surpassed by their teachers. It was Sir Ronald Ross, late of the Indian Civil Service, who, fifteen years ago, made experiments which proved that certain tropical diseases were not due

to the climate, or to the water, but to the bite of mosquitoes. Ross demonstrated this in the case of malaria. Experiments showed that other diseases were carried in the same way. Italian doctors next came into the field, and the new axiom was, "If you want to stop tropical diseases, hunt down the mosquitoes." It was then that the Americans took up the study, and it was in Cuba their Army doctors discovered that yellow fever was not transmitted by ordinary infection, but was brought about by a particular kind of mosquito biting a sufferer from yellow fever and infecting another man by stinging him. The educated medical men in Panama acknowledge frankly their indebtedness to Sir Ronald Ross, who discovered the cause of so much disease; but I mention his name because the vast majority of Americans are surprised, if not indignant, if there is any suggestion that the Americans have not led the world in dealing with tropical diseases. They have not done that, though they have done splendid service in assisting the world.

So whilst there are admirably equipped hospitals in the Zone—that at Ancon is unquestionably the finest tropical hospital to be found—Colonel Gorgas and his men hunt the disease-bringers to their haunts and kill them. The mosquito must have water. But he hates kerosene. Smear a swampy breeding place with kerosene, and the mosquito cannot travel.



SPRAYING TRENCHES WITH KEROSENE TO KILL THE MALARIA
MOSQUITO.

You see miles of gullies and the region of pools all blackened with the stuff. That puts an end to Mr. Mosquito. But each side of the Canal workings is crowded jungle, and in the shadows damp patch may join damp patch, and the whole form a passage way for the mosquito to travel. When it is discovered that mosquitoes are buzzing in a district, men are set to find the trail of the insects, push into the fiercely resisting jungle, and bar the path with sprinkled kerosene.

There is a popular delusion that the whole of the Isthmus has been rendered free from disease by Colonel Gorgas. I remember hearing this fine and modest gentleman laugh at the idea. So far as the fever-breeding mosquitoes are concerned, all that has been done is, by kerosene, to fence off the working parts. Outside that, in the jungle, affairs are just as they were. During three weeks I was staying in Panama City, I can recall only two nights when the song of the mosquito sounded in my room.

War on the mosquito is constantly waged. Till the Americans got their sprinklers at work more people died every year in the Isthmus of Panama as the direct consequence of mosquito bites than were killed in the Spanish-American War.

The jungle breeds half a hundred different kinds of mosquitoes. Most of them are harmless, and their little sting has no worse result than occasional bad

language. But harmless or harmful, the sanitation authorities are out to kill them. There is no time to be wasted in passing an examination. The innocent have the fate of guilty species—the anopheles, which gives you malaria, and the stegomyia, which soon makes you die in agony from yellow fever.

Some two hundred thousand gallons of oil a year have been used in extermination. With a copper can strapped to his back—in shape much like a Swiss milk carrier—a nigger with a tube in his fist goes tramping, in an area he has to look after, through bush and rough grass and rank weeds, searching for the home of the mosquitoes. Spongy marsh land with pools must be closely sprinkled. So when the mosquito larva comes up through the water to breathe it runs into the greasy scum, and it never knows for what purpose it came into the world.

Thus, with oil for mosquitoes and quinine for men, the chief scourge of the Zone is scotched.

Typhoid, however, spreads up and down the Zone. The mosquito is not blamed for this; it has enough sins of its own. The house fly is proclaimed as the common enemy, and a price is upon its head. The medical men of the Isthmus say the fly picks up the disease by tramping in garbage heaps. The germ sticks to its legs; the fly soars away; it alights on a piece of sugar; a bit of the gathered dirt—really

dust of a plant which grows on garbage heaps—is shaken off; the sugar is consumed by a human; consequence, typhoid. That is what was carefully explained to me, and that is why every house in the Isthmus is periodically inspected, to the disgust of many Panamanians—though they do not now all believe, which was the general impression at first, that Ancon Hospital is a place in which Panamanians are to be killed—and why there is a systematic disposal of garbage. It is not just carted away and dumped outside the range of residence. In every one of the settlements is a garbage furnace, and hundreds of tons are burnt every day.

Pure water is a necessity to health, and water obtained from any source was the system the Americans found when first they came on the scene. No wonder illness was rampant. Now there are two great reservoirs in the hills, and pipes stretching to ocean and ocean put everyone within easy reach of good water. These black painted pipes trail above ground like a serpent miles in length.

Pneumonia is rather bad in the Isthmus. Indeed, at the present time, notwithstanding the temperature, there are more deaths from pneumonia than from any other disease; not amongst whites, but amongst the black population, who are inclined to sleep in wet clothes after a hard day of work in the rainy season.

The transformation which has been effected in the health of Panama is something to be remembered. The reason, however, this unhealthy track was used from the earliest Spanish days was obviously because it was the short cut between the seas. From earliest days its reputation has been sinister. Expedition after expedition has been decimated, not by the arrows of the natives or the flintlocks of rival parties, but simply by the awful ravages of fever. No monster of mythological days ever gobbled men with the rapacious hunger of the real fever monster of Panama. To read the records of the first settlements, especially on the Atlantic side, was to sup of the most gruesome horrors. Yet I fancy there was a bit of exaggeration about the stories. In recent times I know there has been exaggeration. I have often referred to the railway between Colon and Panama, which was made with enormous difficulty over sixty years ago. Many men fell by the way. But if you get into conversation with a white resident about the railroad, and he sees you are a stranger, it is a hundred to one that he will supply you with the little piece of dramatic information that for every tie (*Anglice* : sleeper) on the line a life was sacrificed. This is the wildest exaggeration ; but thousands of white folk in the Isthmus believe it.

When the French were making their attempt to cut a way they were unfortunate as well as negligent.

As I have remarked, their mistake was to centre their medical skill upon curing people who were ill, instead of improving the sanitation to decrease their chances of getting ill. Most of us know the Spanish ideas of cleanliness, the colossal ignorance in regard to elementary precautions; and nothing was done by the new-comers to provide unpolluted water or sewers, or to clean up the filth in the villages. To-day in the hospitals at Ancon and Colon are trained, courteous, and cultured nurses; but the French provided Sisters of Mercy as nurses. They were noble women, but they were not experts in nursing. They prayed and were gentle-mannered by the bedside of the sick. The American nurses do not pray; they see that the invalid has fresh air, suitable diet, and they are skilled in the bandaging of wounds. At any hour of the night the sufferer can call a nurse. I was told this was not so in the French days. After evening prayers the hospital was closed, and nobody came till the morning, when sisters returned to pray and brothers to carry out those who had died in the night.

It seems a simple and obvious thing now; but there was more than a spark of genius in the decision of the Americans when, after long delays, the opportunity came for them to build the Canal, that for about three years they did little building, but concentrated all their thought on making it possible for

men to build without dying in numbers whilst doing so. I say this was "the decision of the Americans," and by that I mean the Americans on the spot. The people in the States were not so much impressed by this necessity; what they were mainly anxious about was, in their own language, "to see the dirt fly." Reprimands came from Washington at the slowness of the excavations. Hustle was wanted; the newspapers desired tangible proof that mountains were being removed. The men on the spot did get some steam shovels and set them to work; this was in order to demonstrate something was being done in excavation. What, however, they were worrying about was, first of all, to make the Isthmus a liveable place.

When Colonel Gorgas went out as chief sanitary officer he did not find things smooth. American politicians have often a blunt and brusque way of expressing their opinions, and a man less convinced than Colonel Gorgas that he was absolutely on the right path might have thrown the job up in disgust. The first thing he set about was to provide good water and effective sewerage. Plans were prepared; dams for reservoirs were constructed. But the United States Government was slack in sending out the pipes. It took eight months before they were all delivered. Yet within four months the Isthmus had its water and sewerage scheme. Next, the stink-



A SECTION OF THE GREAT CULEBRA CUT, JUNE, 1912.

ing, fetid condition of Panama City had to be looked to. Instead of foul mire being prevalent, the main streets were paved with brick and the other streets were macadamised.

We complain of the hampering effect of red tape in British departments. American administration, so far as the Canal was concerned, was tangled with red tape. The local men said certain things were needed; the report went to Washington; it was considered in dilatory fashion by men who had no right to an opinion. Sometimes the request was rejected; sometimes approved; and then there was advertising for material or instruments, and delay in coming to a decision. So there was waiting for months to get wire netting to protect the windows of the central offices in the Zone. When a request was made for wire netting to guard the official buildings it was refused on the double ground, first, it was unnecessary, and, second, it would cost too much. Colonel Gorgas asked for wire netting, at any rate, to guard the verandas of the hospitals. The request was refused. When it was seen by Colonel Gorgas and his colleagues that whatever they did would be useless so long as the two Spanish towns of Panama and Colon were allowed to remain sinks of disease, and that, therefore, it was necessary to take charge of the sanitation in those two places, consent was held back for months, and was only

acceded to when yellow fever was likely to become an epidemic amongst the whites. When the fresh-water supply was decided upon, and the pipes came tardily, and a cablegram was sent to Washington urging haste, the reply was that "cablegrams cost money." No doubt the Government at Washington and its representatives, the members of the Canal Commission, were anxious not to imitate the French in reckless expenditure. They jumped to the other extreme; they were parsimonious, and on the top of that they were dilatory.

Despite rebuffs, the men on the spot were persistent. They remembered the death rate during the French occupation, rising at one time to so startling a height as 6 per cent. Though after the French had departed there were few cases of yellow fever, the Americans, to their dismay, found when they took charge that it began to increase again. Conceive the effect of this on the minds of the American colony. Demoralisation, panic, together with a fatalistic callousness, took possession of people. The daring ones, feeling they were gambling with death, were satirical about the health notices issued by the sanitary staff; even when netting came they showed their contempt by tearing it. The Government, of course, relied on the Commission, and the Commission were slack, if not antagonistic, toward the sanitary officers. These latter, fired with

a great purpose, were no doubt regarded as nervous busybodies, thinking their department was the most important of all—which it was at that time, as history has proved. If fault there was, I think it really lay with Washington. Officials there were apparently unable to realise the situation. And behind Washington was public opinion. Popular clamour is the most dangerous of guides. The American mind at that time was working on this line: “Get on with cutting the Canal; get on with it. Americans are not Frenchmen, likely to be knocked over by the first nasty smell. What is the good of wasting time and money in trying to make the place healthy? Get on with the building of the Canal; make the dirt fly.” The sanitary authorities said, “But we must make the place possible to live in first.” The comment of the Commission amounted to, “Yes; but you see how impatient the public is. They do not mind finding money, but they expect it to be spent in excavating the Canal, and not in special net-guarded residences and in tons of quinine, and in the latest fal-lals of surgical instruments.”

Thus it was that work had to be started before the place was ready for the big incursion of workmen. The American nation insisted on seeing something for its money. Thousands of men were engaged to work, and the American nation heard of something,

though it did not see it. In a month there were thirty-eight cases of yellow fever in the Isthmus, and there were all the indications of an increase. Men who went through those days have told me of the fear which chilled the hearts of those who were not displaying swaggering unconcern. Yellow fever hit swiftly ; it was ghastly ; the chance of recovery was small ; death came with awful terrors. The Governor of the Zone and United States Minister to Panama was Mr. Charles E. Magoon. He did his best to frighten the braggarts. He insisted on screens to the dwellings to keep out the mosquitoes, insisted on their being kept closed, and threatened harsh punishment on men who refused to take precautions. Next it was decided to fumigate every building in Panama to slay the stegomyia. This was done in just over a month. There was to be an instant report of anyone suffering from fever, and not the all-important three or four days allowed to elapse before someone took it into his head to tell the authorities the man was really bad. The inspectors were few, and, try as they would, they could not lay the epidemic. Eight Panamanian doctors were employed ; each of them had an eighth part of the city of Panama within his radius ; each had to make an inspection of every house within his particular area every day. These Panamanians did good in teaching their own people that the object of

the interfering Americans was to do them benefit and not harm.

Still there was much to be done. Schools of sanitation were started throughout the Zone, and all employees had to attend the lectures. A systematic endeavour was made to stamp out the mosquitoes, especially in Panama itself, where the Spanish people were by no means so likely to be afflicted as the newly arrived white Americans. Supplying the city with fresh water gave excuse for destroying the tanks and barrels formerly used, which were mosquito breeding places. Every can or pot lying about the town, and likely to hold a little water, was removed. Every nook into which water might drain was saturated with kerosene. The same thing was done at Colon. All along the working stretch of the Canal Zone, wherever there was a puddle or pool or a stretch of water, the kerosene sprinkler was brought to work. The thirty-eight cases in May, 1905, went up to sixty-two in June, 1905, when Mr. Magoon was giving every encouragement to Colonel Gorgas and his men. At the beginning of their labours it looked as though dire failure would be the result. The prospect was black. It was contemplated removing the official staff to the healthy island of Taboga, in Panama Bay. The next month, however, the hard work began to tell. In July the number of yellow fever cases was down to forty-two; in August it

was down to twenty-seven; in September it was down to six. The yellow fever stopped, and though since September, 1905, there have been rumours of cases, and I believe one or two cases which were imported, the glorious fact is that since then there has not been a single substantiated case of yellow fever in the Zone.

The death rate in Panama is now only 25 per thousand a year, and Americans—rightly proud of what has been done, though the American nation deserve no credit, for it hampered rather than helped Colonel Gorgas—point to the superiority of this rate over Bombay, where it is 55 per thousand, Madras 35, Calcutta 30, and so on. Here I am afraid Americans do what some of them are too prone to do, fail to compare like with like. All the people, black and white—apart from the Panamanians—are picked, healthy people; men and women in the flush of their manhood and womanhood, and every arrival has to be certified healthy and pass through a sieve of inspection. You ought not, therefore, to compare the death rate under such exceptional circumstances with the normal death rate in Oriental or Western cities. I write this in no spirit of depreciation, but with a desire to get a proper proportion into the value of what has been accomplished.

Any way, the sterling result is for the appre-

ciation of all men. The Americans found Panama a sink of death. They have made it a place where the healthy man, if he takes ordinary precautions, may continue to be healthy and not suffer from life in the tropics, except the slight enervation which is usual in all tropical lands, however healthy.

CHAPTER XI

THE REALISATION OF A DREAM

THE building of the Canal is the realisation of a dream which has been in men's minds for over four hundred years.

Remember that the aspiration of Columbus was to find a new way from Europe to Asia. He thought he had done so, and he died without knowing he had found a new continent. On his fourth and last voyage he was on the Isthmus, and went part way up the River of Crocodiles, now known as the Chagres River, the waters of which provide the means for doing what Columbus thought he had done.

He fumbled for a passage. The natives had told him of "a narrow place between two waters"—the Isthmus—but he assumed it was a strait which would lead him to China. It was on November 2nd, 1502, that he landed at Puerto Bello, subsequently to become a Spanish fortress, the burial place of Francis Drake—who sleeps his long sleep in the mud at the bottom of the harbour—and the rocks of Puerto Bello have been blasted during the last ten years to provide material for the breakwater on the

quarrelsome and imperious. When his superiors endeavoured to check him, he arrested and imprisoned them. He married a native princess; he made allies with the native chiefs; he became all powerful.

The news of his high-handedness reached King Ferdinand in Spain. Things were going to be rough for Balboa, who was a usurper of authority and the cause of much mischief. As the new land was only regarded as a fount of treasure for the aggrandisement of Spain, Balboa decided to do something flashy. He, with the rest, had heard of the great western sea leading to a land of gold. With a little force he pushed through the jungle. It was a rough, mountainous and tangled way—to-day it is just the same as it was then—and on September 25th, 1513, he stood on Darien Height, and so was the first European to sight the Pacific. On September 25th this year, 1913, Colonel Goethals hopes a boat will pass from the Atlantic to the Pacific.

Four days later Balboa had reached the coast, and he walked into the sea. It was St. Michael's Day, and he called the spot St. Michael's Bay. What his thoughts were only imagination can conjure. If it was a day like that when I walked along the historic shore, it was grey and stormy, and the ocean angry, and the heavily wooded lands sombre and forbidding. In the wild shroud of the day he saw



CULEBRA CUT AT CULEBRA; VIEW LOOKING SOUTH; BLASTING ROCK ON CONTRACTORS' HILL, JANUARY, 1912.

the Pearl Islands. When he returned to Puerto Bello he had gold and pearls to send to Spain. He immediately received the King's pardon for his past misdeeds, and became Governor of the new lands.

But the King died. A new Governor was appointed, Pedrarias Devila. He was both brusque and cunning, and he hated Balboa. Balboa, however, unable to find a channel between the two oceans, was determined to sail the new sea. In 1516 he had four brigantines carried in sections across the Isthmus, and he also took material for the building of two other ships. His ears were full of stories of immense gold in a region to the south—Peru—and he wanted to have some of it. But Pedrarias had a charge laid against him that he claimed independence from the Spanish King, had him arrested by Pizarro, and executed. And that was the end of Balboa, the first to see the Pacific, a man whose name will be ever associated with the Isthmus, and who has had a much advertised and much consumed local beer called after him.

Then came the founding of old Panama City—of which more anon—only to be sacked by the Welsh filibuster, Henry Morgan, a century and a half later. From the Isle of Pearls were brought jewels as big as nuts. But always there was that search for the hidden river which joined the two oceans. It was believed in. Expedition after expedition searched

the coast line, went up rivers, climbed mountains, wheedled, bullied and tortured the natives in the hope that the secret would be revealed. The chief, Nicarao, with his territory by the sea of Nicarao (Nicaragua), gave hopes—but they were falsified. Still the search continued by men whose names are but scrawls upon the scroll of time.

At last France came along and took up the search. Jacques Cartier explored as far north as Labrador, led on by the tales of the natives. That was the beginning of the French settlements in the Western world. Others went as far south as the Straits of Magellan, and although here a path was found, it was not the path that was being sought. Somewhere in the centre of America, somewhere in the region of the Isthmus of Panama, there must be a way: that was the firm belief, and men risked and lost their lives with the frenzy of discovery upon them. Hernando Cortez, the conqueror of Peru, had five ships built on the Panama side and they made slow, systematic search. There were rival expeditions seeking the honour of finding the way; there was treason, fighting, killing. For twenty-five years there was diligent looking for a water-way. Men were confident it existed, and were heart-broken at their failures.

It was Cortez himself who in those far-away days, and impatient with the futility of searching, first

conceived the idea of a canal. There have been hundreds of schemes during the last four centuries as to the proper way to make a canal, but the first plan was preferred in 1529 by Alvaro de Saavedra Ceron, who had been with Balboa, and was cousin to Cortez. He, indeed, had four routes—by way of Panama, Nicaragua, Tehuantepec and Darien. The disputes we have had in our time over the rival merits of the Panama and Nicaragua routes have been but repetitions of the hot quarrels there were over these very routes four hundred years ago.

Charles V. of Spain was eager, and pressed on his representatives in Hispaniola to proceed with the work. Gomara, the historian, wrote in 1551: "There are mountains, but there are also hands. Give me the resolve and the task will be accomplished. If determination is not lacking means will not fail; the Indies to which the way is to be made will furnish them. To a King of Spain, seeking the wealth of Indian commerce, that which is possible is also easy." It was no good. Philip II. sent engineers to cut the canal. Still it was no good.

About that time England was beginning to contest with Spain the supremacy of the seas. A dread came to the Spaniards. What if they built a canal and it fell into the hands of the English! So Spain solemnly decided it would be an insult to Providence to join two seas which the Almighty

had divided. And anyone who attempted to make a canal would pay the penalty of death!

Then the battles on the Spanish Main and Drake constantly harrying Spanish ships. Spain had other things to occupy her than building a canal, and I can find little talk about one for a century. But Spain took up the idea again. England had Jamaica. It was thought that Spain's fortunes would be improved if there were a canal between the Atlantic and the Pacific, and this time the Nicaragua route was favoured. Nothing came of this scheme either. There was much fighting, freebooting and carnage between the two nations around the islands of the Indies. Spanish towns were sacked; Spanish trade was ruined. It was the day of bold, bad buccaneers, and Henry Morgan was the chief of the tribe. His deeds of derring-do in the Isthmus, way-laying Spanish mule caravans laden with Peruvian gold on the hilly jungle road between Panama and Puerto Bello, are still told with wonder. He did not bother himself about canals. But among his companions was one Lionel Wafer, who reported home there were valleys through the Isthmus, and he thought there would be no difficulty in making an artificial river.

Now the name of William Paterson, a Scot, is recalled by the world as that of the man who founded the Bank of England. Paterson, however, was more



CULEBRA CUT, LOOKING NORTH FROM A POINT JUST SOUTH OF THE EMPIRE
SUSPENSION BRIDGE, MAY, 1912.

The train at the lowest point of the excavation is 27 feet above the bottom of the cut.

than a banker; he was a visionary. Being a man of knowledge and reading, he knew something of the wealth of Africa and the Indies. He dreamed more. He was a pioneer, daring and wide-ranged in his operations. Company-floating is an every morning occupation nowatimes in London. It was a hazardous affair in the sixteenth century. Paterson incorporated "The Company of Scotland trading to Africa and the Indies." Eyes were fixed on the Isthmus. A body of colonists sailed from Leith. They found their landing place in Caledonia Bay, and they proceeded to build the towns of New Edinburgh and New St. Andrews. But the colony was badly planned; disaster dogged it; and, as narrated in another chapter, it came to an inglorious end.

The Spaniards being no longer able to shake the fist at new-comers, other attempts were made to settle the Isthmus with British people. They all failed. The district was too abominably unhealthy. The only relics of those melancholy endeavours are the names of Caledonia Bay and Puerto Escoces.

Still navigators, merchants, adventurers constantly turned to this neck of land and wished for the day when it would be cleft and a fair waterway opened to the wonderland on the western slopes of the Americas. Spain had tried and failed. Britain set out with high project and failed also. France

came. Surveys were made, and a route by the Nicaragua lakes was thought possible. Nelson chased the French, and in 1780 was at Nicaragua to get control of the lakes and check the designs of France. Yet it was always the same story: nothing was easier than a canal, yet no one started to cut. If a map of the Isthmus could be marked with the canals which have been projected, dozens of tracks would score it. Why, at the beginning of the nineteenth century, Alexander von Humboldt, who had made extensive expeditions, drew up a list of nine ways suitable for a canal.

The Isthmus was then part of the gigantic Spanish territory of Colombia. Spain suddenly galvanised itself into action, and in 1814 said a canal must and should be made. But some of the Spanish States took it into their heads to declare their independence. There was the Colombian Federation (comprising the present Republic of Venezuela), Quito (which is the Republic of Ecuador), and New Granada (the present Republic of Colombia). With these wayward children causing the Mother Country anxiety, Spain, still dreaming of a canal—and, notwithstanding energetic words, doing little but dream—turned to the United States, which was just stretching its arms in its new strength as an independent nation, and suggested a helping hand should be given. Negotiations were slow. But in

1825 there was a Congress of the States of Central America ; it was decided a canal should be built via Nicaragua, and a concession was given to a man named Benister. He passed it on to an American company, which, after getting funds together, failed.

That money could be made by a canal was firmly believed. Foreign adventurers came in a flock ; concession overlapped concession ; companies blossomed and withered ; frequent starts were made, and they always came to nothing. However, the United States of America, though by no means enthusiastic, had a glimmering consciousness that a canal would be advantageous—though that was long before the discovery of gold in California. The United States talked but did nothing. Then the Republics of Central America turned to Europe for capital. English engineers appeared and were cautious in their advice. The French were much more daring. They had one of the old concessions, and Louis Napoleon Bonaparte, whilst in prison, got from the Nicaraguan Government in 1846 a definite concession for “*La Canale Napoleon de Nicaragua.*” The mind of Louis Napoleon was inflamed with the scheme. “*Let me go to Nicaragua,*” said he, “*and I’ll never trouble France again.*” But he was not allowed to take his departure.

Anyway, the world now began to realise that a canal was within the range of accomplishment.

And each country began to realise its interests might suffer if a rival possessed the canal. French and United States activities and talk induced Great Britain to take stock of its position in Central America. The English had settlements in Honduras and Nicaragua, and treaties were in existence between Great Britain and Spain acknowledging claims. A British suzerainty was recognised by the Mosquito Indians in Nicaragua, and an Englishman named Oldman was said to be their king. Boundaries were ill defined in those days; the regions were unhealthy. The diplomatic eye was not always watching, and nobody thought of trouble. But without doubt the British, by virtue of occupation, had rights in Central America. There was British Honduras, and the Mosquito country was a dependency of Jamaica.

So it gradually came to be understood that if a canal were cut through Nicaragua it could be only with Britain's approval. The United States, having been shilly-shallying for many years, and recently much occupied with grabbing Mexico and getting excited over gold in California, all at once woke to the possibility that she was going to be out of the fair. Something had to be done. A treaty was negotiated with New Granada (Colombia) giving the United States exclusive transit across the Isthmus. But there was to be neutrality of

routes, and the sovereignty of Isthmian territory to be recognised.

Now there began a rivalry between the Nicaraguan and Panamanian routes. The idea was to have coaches on the land and ships on the Nicaragua lakes, and so hurry passengers from the Atlantic to the Pacific seaboards. This, however, was completely outdone by the construction, after many difficulties, and the forfeiture from sickness of many lives, of a railway, fifty miles long, between Colon and Panama in 1855.

Still there was fear in the United States of what Great Britain would do. America began to make further negotiations with Nicaragua, and it was suddenly announced that the United States had guaranteed to guard Nicaraguan independence in return for the exclusive rights to construct a transit way, rail or canal. This ignored all British claims. England was emphatic, and the United States had to repudiate its envoy, Mr. Hise. America realised it had acted high-handedly. Yet, although it retired for the moment, it was determinedly anxious to hinder England making the canal—for at this time the Nicaraguan route was first favourite. So another envoy was sent south, and he negotiated a treaty with Nicaragua that there should be "equal rights of transit for all nations through a canal which should be hampered by no restrictions." If

the United States could not have supreme control it was eager to prevent anybody else. Let all nations be on an equality, was its attitude—and it is worth while to remember this in view of what subsequently took place.

But as America had now by treaty a grip on Panama with which Great Britain could not interfere, Great Britain insisted she had claims in Nicaragua superior to any that America could advance. America, ever resourceful, checkmated Britain by getting the shores of Nicaragua ceded to the United States. The British answer was to send battleships and take possession of Tigre Island. The British were told to get out. They refused. For a time the sky was black, but the matter was settled by the United States formally recognising British supremacy on the Mosquito Coast in return for Great Britain undertaking to raise no objection to the construction of a neutral canal. That was the deal.

So there was drawn up the treaty between Secretary Clayton on behalf of the United States, and Sir Henry Bulwer, the British Minister, on behalf of this country. This was the Clayton-Bulwer Treaty which caused trouble later on. Its terms, however, were quite explicit :

1. That neither country should exclusively control the Nicaragua Canal or build fortifications.
2. That neither should fortify, colonise or exercise dominion or protection over Central America.



GATUN LOWER LOCKS—MIDDLE AND UPPER LOCKS IN THE DISTANCE, JANUARY, 1912.



3. That both would guard the safety and neutrality of the canal and invite other nations to do the same.

Thus a definite "general principle" was established.

But the United States soon showed she was unhappy. She displayed a ruffled temper. After having been a partner in the treaty she said she did not like it, and wanted something else. Growling did not alter matters, and so intrigue was attempted. An endeavour to get England to withdraw from the Mosquito Coast failed. The United States next threatened to abrogate the treaty. There were renewed conferences between the two nations. England had no desire to quarrel, and she yielded her protectorate over the Mosquito Coast, gave the region back to Nicaragua, recognised the independence of that Republic, but made it clear that if Nicaragua tried to dispose of her authority to another Power she would have the right to step in again. America got angry; her contention was that what Britain had yielded was only shadowy.

All this roused resentment in the minds of European statesmen. M. Felix Belly, who represented France in Nicaragua, thought the best plan would be to put the country under the protection of the European Powers, and to place French warships on the lake, for France had no territorial desires. The United States became indignant. At

that time Mr. Cass, the United States Secretary of State, wrote to Mr. Mason, the American Minister in Paris, "We desire to see the Isthmian routes opened and free for the commerce and intercourse of the world, and we desire to see the States of that region well governed and flourishing and free from the control of all foreign Powers." That was quite right; but there was always an explosion of wrath at Washington if any foreign Power declared the United States should mark the same line.

At last everybody agreed that all the nations should recognise the independence of the Central American States and not interfere. Immediately afterwards, however, (1861) the Central America Transit Company, financed from New York, got a monopoly on the San Juan River and Lake Nicaragua. It was a failure, and ultimately the concession was sold to an Italian company, which uselessly held it for twenty years and then re-sold it to the American Maritime Canal Company.

Now before this the United States had directed its fancy to the Tehuantepec Isthmus, a comparatively narrow neck of land at the corner of Mexico. About 1840 America, after much negotiation, did succeed in getting the exclusive right to build a canal in that region. As in other cases, America did not exercise her advantages. The whole thing fell into abeyance.

But during the last dozen years there has been much English railway enterprise in Mexico, and Sir Wectman Pearson (now Lord Cowdray) built a line from the Atlantic to the Pacific over this very track, with accommodation for shipping. Without doubt this route will be a rival to the Panama route. Indeed, for years various companies surveyed possible ways for a canal in Central America. The English investigated the Caledonian Bay route and the Atrato River routes—and in regard to the latter there were constant stories of boats being taken from ocean to ocean—but America did little except, when a company of another country got a concession, to raise objections and proclaim that it must do something itself. At last America made investigations in the Panama area. The report was not at all favourable, for it was said that not only would locks be necessary but there would have to be tunnelling for seven miles. However, in 1869—when the French achievement in cutting the Suez Canal fired imagination—the United States made a treaty with Colombia, of which Panama was then a part, for the building of “an American canal under American control.” As usual nothing came of it.

Still there was a hankering after the Nicaragua route. The Clayton-Bulwer Treaty had contemplated a canal. But as no canal had been made, the Americans conceived the idea that would be a good excuse

for abrogating the treaty. Indeed, the Americans were gradually evolving a policy that no European country should do the work. It was therefore in the year I have mentioned (1869) the United States realised it could no longer play the dog in the manger, and that its duty was something besides spoiling the pitch of other countries. Accordingly there was much energy and extensive surveying, and the conclusion was that the Nicaragua route was the best. Still the Clayton-Bulwer Treaty was in the way, and again nothing was done.

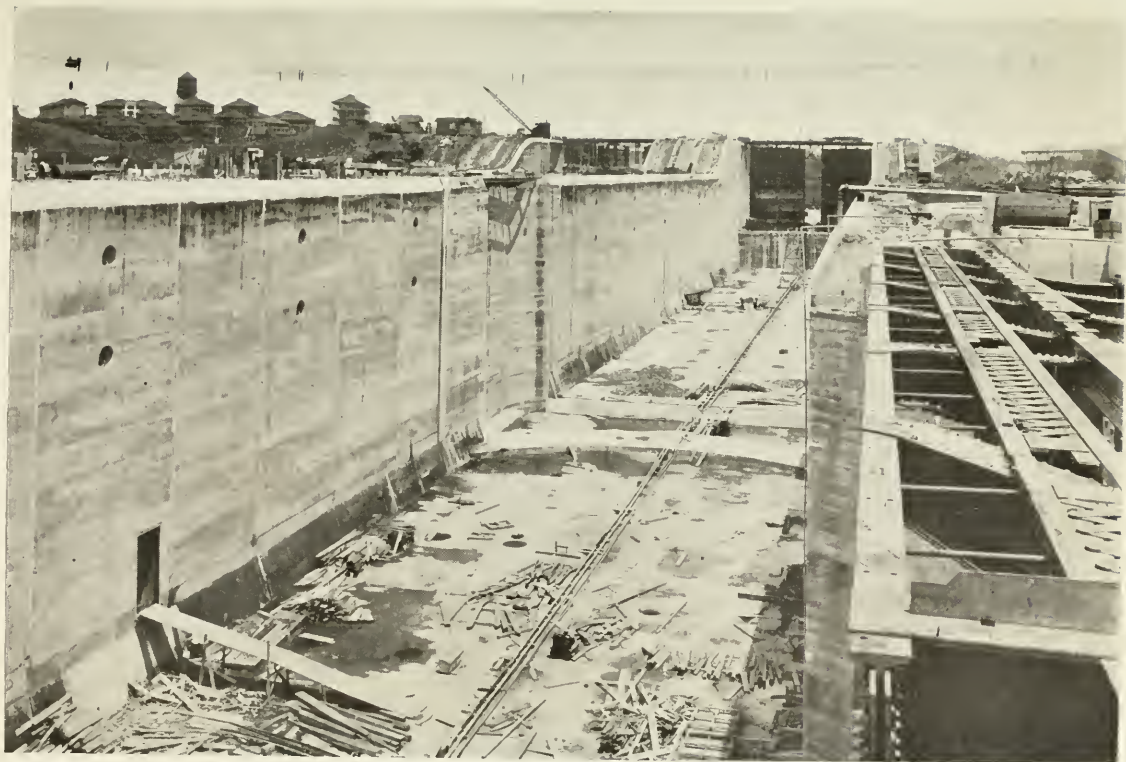
The Republic of Colombia was eager to have a canal made through the Panama Isthmus—there was money in it. Welcome was given to any likely person or company that came along. As America evidently did not mean business, France was favoured. Lieutenant Armand Reclus was the go-between. So there came into existence "La Société Civile Internationale du Canal Interocéanique," which decided on a sea level canal with a tunnel between four and five miles long. There was an International Engineering Congress in Paris, presided over by Count Ferdinand de Lesseps. A Central American canal was discussed. American and English opinion was favourable to Nicaragua, but a resolution backing the Panama route was carried. The Société Civile having sold its rights to Lieutenant Wyse, an American who was enthusiastic for the way over

which the canal is now constructed, the Universal Inter-oceanic Canal Company, incorporated by de Lesseps, purchased the rights which Wyse held. Naturally, the United States was up in arms. It really looked as though the French were going to work. The sacred rights of the Monroe Doctrine were invoked. The Americans hustled to start a company of their own. Delegates were hurried to Nicaragua, and, ignoring the Clayton-Bulwer Treaty, a concession was obtained on condition that the making of a canal began within two years of May 22nd, 1880. It never was. De Lesseps went to Panama; there was much enthusiasm; the great engineer reported all plans were ready to proceed with a canal to cost £25,000,000, and it was to be under a European guarantee of neutrality.

The Government of the United States was in a ferment. President Hayes was quick to send a message to the Senate proclaiming that any canal must be under United States control and United States control only. European Powers were to keep out. Concessions to foreigners and treaties were to count for nothing if the sovereignty of the United States was jeopardised. Frenchmen could build the Panama Canal with French money, but it was America which would have the making of the regulations. The funny thing was that, whilst Americans were shouting for the smashing of treaties which

blocked the way of her ambition, they were furious that de Lesseps should be endeavouring to persuade the Colombian Government to break a treaty made with the United States in 1846, by which the United States had a right of way or transit across the Isthmus of Panama. America threatened Colombia. There was string-pulling. De Lesseps was accused of corruption in the United States in order to swing public opinion in his favour. De Lesseps, however, went back to Paris, buoyantly happy, to raise the necessary capital, and he dismissed the American opposition as mere jealousy of France. Thus whilst most Americans were shouting "We must keep the French away from Panama," a considerable body was crying out for progress to be made with the Nicaragua Canal, and another section was advocating a ship railroad over the Tehuantepec route, to carry the largest ocean-going vessels from the Atlantic to the Pacific. Mexico was healthier than Panama; it was much nearer the centre of the world's commerce; it would save time. America was determined on something practical to dish de Lesseps. It did nothing but talk.

But wonders would be accomplished if only the Clayton-Bulwer Treaty could be got rid of! England sat still. Diplomatic pressure was tried. Mr. Blaine, Secretary of State to President Garfield, had a letter addressed to all the European Powers pointing out how



GATUN MIDDLE LOCKS, LOOKING SOUTH, JUNE 7, 1912.



unnecessary was a European guarantee of neutrality over an American canal, because, said he, the United States had already "positively and efficaciously" guaranteed the neutrality of the route. Besides, he added, a European guarantee would be offensive to the United States. Indeed, he wound up with a plain intimation there would be war if any European Power interfered with what were United States rights.

It was a forcible letter; but Mr. Blaine had forgotten Great Britain. Britain simply reminded the world of its rights in Nicaragua. Nicaragua had been left free by England on condition it did not give special privileges to other countries, and on a promise that it would pay an indemnity to the Mosquito Indians. This had not been done, because Nicaragua thought America would support her in not paying it. America failed. The dispute between England and Nicaragua went for settlement by arbitration before the Emperor of Austria. He declared against Nicaragua. Accordingly, with Nicaragua as a party, the claim of Britain to control the long-talked-of Nicaragua Canal where it would enter the Caribbean Sea was re-established. Americans now admit that, excellent though Mr. Blaine's intentions were from his country's point of view, he made a mess of things. The authority of the Clayton-Bulwer Treaty having been reaffirmed

before the world, Mr. Blaine immediately began to engineer to have it abrogated—and that was not a propitious hour to approach England. However, he wrote to the British Government, pointing out that, whilst America was ready to build the Canal, it would be unfair for British warships to have the practical control of it. He asked that America should be released from the treaty, but that Great Britain should still be bound by it. He asked that the Isthmus of Nicaragua and Panama should be under the sole protection of the United States, and in return he promised absolute neutrality of the Canal. He followed this up with a second communication. The only answer he got from Lord Granville, then British Foreign Secretary, was that his arguments were “novel in international law.” The debate continued in other hands, but so far as the result counted America was worsted.

Meanwhile “Le Grand Français,” with splendid enthusiasm, was proceeding with his project to cut the Panama Canal. He asked for £12,000,000, and was offered £25,000,000, mostly from French investors. It certainly looked as though the dream of the centuries was about to become a reality.