

The coal trade of Pennsylvania commenced in 1820, with a total production and sale of 365 tons. In 1873 the State produced 22,828,118 tons of anthracite and 6,085,222 tons of bituminous coal. About the year 1858, the Penn Rock Oil Company was organized on a farm near Titusville. It produced about eight barrels a day. From that time to 1870 there have been produced 32,512,226 barrels of this oil, of which 15,851,246 barrels were exported to all parts of the world. Now compare this condition of our State with its resources one hundred years ago, when Dr. Franklin said there were but about 100,000 white inhabitants, and when, according to the highest statement given, when it assumed sovereign powers, its population was not over 800,000.

SLEEP AND HOW TO SECURE IT.

MR. FRANK BUCKLAND, in a recent article on this subject in 'Land and Water,' takes the ground that it is natural for man, like other animals, to sleep soon after eating:

The human frame cannot do without sleep. I believe the reason is that the mysterious property—for want of a better name we call it "vital energy"—gradually leaks out during the day. During sleep, the machinery of the body, especially the brain, becomes recharged with it. The cause of not being able to sleep—I write now of people in good health, and hard workers with their brains—is that the brain cannot, so to speak, "go down," but it continues to act, more or less. My father, when writing the Bridgewater Treatise, had his own way of working. He was an excessively busy man during the day, and had only the night hours in which he could write. He generally dined at seven o'clock, and immediately after dinner went to sleep for two or three hours. He then got up, and worked on till two or three in the morning. Just before retiring to rest, he took some light pudding, or a sandwich, with cocoa or milk. Thus he always slept well, as the blood was diverted from the brain to the stomach.

I have no hesitation in saying that the proper thing to do is to sleep immediately (or at least very soon) after the meal of the day. All animals also go to sleep, if they are not disturbed, after eating. This is especially noticeable in dogs; and the great John Hunter showed by an experiment that digestion went on during sleep more than when the animal was awake and going about. This is his experiment: He took two dogs and gave them both the same quantity of food. One of them was then allowed to go to sleep, and the other was taken out hunting. At the end of three or four hours he killed both these dogs. The food in the stomach of the dog which had been asleep was quite digested; in that of the one which had been hunting, the food was not digested at all.

I recollect the late Dr. Wilberforce, then Bishop of Oxford, telling my father, then most actively engaged as Dean of Westminster, of his patent way of going to sleep. It is better than the old fashioned prescription of watching sheep jumping through a hedge one after another, ships sailing out to sea, &c. The Bishop's prescription was to repeat very slowly the vowels a, e, i, o, u. In doing this they were to be faintly pronounced with each inspiration and expiration. It will be found easy to do this without moving the lips, but the vowel u must not be pronounced, for to do this the muscular action of the lips necessarily takes place, and sleep comes not. I advise my readers to try this plan.

I now venture to suggest a new but simple remedy for want of sleep. Opiates in any form, even the *Liquor opii sedati*, and chlorodyne, will leave traces of their influence the next morning. I therefore prescribe for myself, and have frequently done so for others—onions; simply common onions raw, but Spanish onions stewed will do. Everybody knows the taste of onions; this is due to a peculiar essential oil contained in this most valuable and healthy root. This oil has, I am sure, highly soporific powers. In my own case they never fail. If I am much pressed with work, and feel I should not sleep, I eat two or three small onions, and the effect is magical. Onions are also excellent things to eat when much exposed to intense cold. Mr. Parnaby, Troutdale Fishery, Keswick, informs me that when collecting salmon and trout eggs in the winter, he finds that common raw onions enable him and his men to bear the ice and cold of the semi-frozen water much better than spirits, beer, &c. The Arctic Expedition, just now about to start, should therefore take a good stock of onions. Finally, if a person cannot sleep, it is because the blood is in his brain, not in his stomach. This is to be done by eating a biscuit, a hard boiled egg, a bit of bread and cheese, or something. Follow this up with a glass of milk, or water, and you will fall asleep.

The Republican managers find that their canvass in this State is going to be up-hill work throughout. The people can't be argued out of the fact that under Tilden their taxes last year reduced about eight millions, and that for the current year they are to be still further reduced by \$5,677,506 29. It is hard to meet that argument, or to divert attention from the facts by any manner of talk. The people like to see the practical results of reform and wise administration, and those Governor Tilden has given them. The Republicans must devote their time to excusing their past delinquencies, and trying to deceive the voters into believing that they are the ones to correct the evils that they have themselves imposed on the Government State and national. This is something that level-headed men refuse to swallow. They will vote for the man and party who actually gave them reform, not for those who rendered the work of reform necessary.—N. Y. Sun.

On the 12th of April, 1861, Montalembert wrote to Cavour the following lines: "You may become masters of Rome as were the barbarians and the persecutors from Alaric to Napoleon I., but you will never be in it as sovereigns or equals of the Pope. Pius IX. may perhaps be your prisoner, even your victim, but he will never be your accomplice." How true was the prediction, the present state of affairs in Italy is all sufficient to demonstrate.

DISCOVERY OF SAN FRANCISCO BAY.

THE Jesuits were the first to take charge of the work in Lower California as far back as the year 1683. In the year 1767 they had colonised and Christianised all that peninsula. But in that year the King of Spain carried into execution a secret resolution that on a certain day he would expel all the Jesuits from his dominions. This act reached the Jesuit missionaries in Lower California. At the concerted day and hour the Governor appeared at the missions in Lower California and summoned the missionaries into his presence, to surrender the missions, together with their reputed treasures of gold and silver. His behest was answered by a few gray haired old priests, bearing the marks of the toil and poverty which they shared with their Indian converts, who accompanied them with tears and lamentation to the ships which bore them away into banishment, like convicted criminals.

The final result of this harsh procedure was that the missions of Lower California were surrendered to the Dominicans, while the virgin field of Upper California was yielded to the Franciscans. This could not have been done at a more fortunate juncture. Father Junipero Serra, at that time President of the Franciscans in California, was a man of fervent piety, indomitable will, irrepressible energy and unconquerable fortitude, all which qualities were concentrated into one purpose, "*ir a la conquista*!"—to conquer souls to the dominion of the Church. Under his auspices the Mission of San Diego, the first settlement made by whites in California, was effected on June 16, 1769, and that of Carmel, at Monterey, on June 3, 1770, together with two Presidios at the same points.

But the establishment there of these two Missions and Presidios of San Diego and Monterey, with the consequent support which they gave to the pious labors of the missionaries, did not satisfy those devoted men. Father Junipero Serra, the founder and first President of the Franciscan Missions of Upper California, and the real conqueror of this region, with that pious zeal for the salvation of souls which prompted him ever to go on with the conquest (*ir a la conquista*), represented to the Marquis de la Croix, the then Viceroy of Mexico, that it was a reproach to Catholic Christianity, that there was no Mission dedicated to San Francisco de Assisi, the founder and patron of the Order which bore his name. There was a tradition among the old native Californians that the Viceroy replied: "If our Father San Francisco wants a Mission dedicated to him, let him show us that good port up beyond Monterey, and he will build him a Mission there." Long before this, there was a report coming down from the early navigators that on the north-western coast about a hundred miles north of Monterey, there existed a large bay, through which large volumes of fresh water poured into the sea from rivers which flowed from an unknown distance in the interior. But later explorers had not been able to find this entrance, and in the time of the Marquis de la Croix, the Bay of San Francisco had come to be considered quite as apocryphal as the Island of Formosa or the Antarctic Continent of Commodore Wilkes in our day. It was therefore with a feeling of prayerful humorlessness that the Viceroy invoked the aid of Saint Francis in the discovery of this concealed harbor. Father Junipero, however, took the Viceroy at his word, and by land expeditions sent from Monterey in 1772, happily established the existence of the Bay of San Francisco, which was afterwards explored by competent engineers entering from the sea, and to which the name of San Francisco, the founder of the Order, became permanently affixed.—Hon. J. W. Dwinelle.

CANONIZED POPES.

THE following are some Popes who have been recognised as Saints or canonized by the Catholic Church. In January the feasts occur of St. Telesphorus, St. Hyginus, St. Anterus, St. Fabian, and St. Marcellus, who all governed the Holy See during the first three centuries before the conversion of Constantine the Great secured the peace of the Church. On the 10th of January the feast of Pope St. Agatho (A.D. 682) is celebrated. In his Pontificate the sixth Œcumenical Council was held at Constantinople to condemn the Monothelites.

In February the Church celebrates the memory of Pope St. Gregory II. (A.D. 731) and of Pope St. Gregory X. (A.D. 1276). The former sent St. Boniface to convert the Germans, and condemned the image breakers of the East. The latter held the fourteenth General Council, that of Lyons, in 1274. St. Thomas Aquinas died on his way to the Council, and St. Bonaventure during its sitting.

In March we come across the names of St. Lucius, martyred A.D. 253, and of St. Sixtus III. (A.D. 440); of St. Simplicius (A.D. 483); St. Gregory (A.D. 604); and St. Zachary (A.D. 752), who confirmed Pepin, the Mayor of the Palace as King of France, and ordered St. Boniface of Germany to crown him.

In April St. Sixtus I., St. Anicetus, St. Soter, St. Caius, martyrs of the early ages, are remembered, as so is St. Julius I. (A.D. 352), in whose Pontificate the Synod of Sardica (A.D. 344) was held; St. Anastasius (A.D. 401), and St. Celestine (A.D. 432), who confirmed the decrees of the Council of Ephesus, which defined the title "Mother of God" as belonging to the Blessed Virgin, and who sent St. Patrick to convert the Irish. The feast of St. Leo the Great (A.D. 461) in whose Pontificate the Council of Chalcedon was held, and who met and repulsed Attila from the gates of Rome, is also celebrated on April 11. St. Leo IX. (A.D. 1054) is another great Pope we meet with in April. In his Pontificate St. Peter Damian wrote his works on the clergy; Lanfranc taught at Bec; Hildebrand (afterwards Pope Gregory VII.) exerts great influence, and the errors of Berengarius on Transubstantiation are condemned.