

## DOES GOLD GROW?

DR. DRAPER has given his testimony to the belief that eventually the dreams of the old Alchemists, of converting the baser metals into gold, may be at some time realized, inasmuch as there are forty elementary metals out of sixty elementary substances. He says emphatically: "It requires some degree of moral courage to present the facts as they actually are, and stem the derision of the conceited and ignorant; *but the metals will one day be transmuted into one another, and the dreams of the Alchemists all realized.*"

It is refreshing always to hear an honest, outspoken conviction uttered, and it is encouraging also, to learn that no earnest endeavor will be totally without results in this world. I have always had a tender leaning toward those patient, pious old philosophers, the Alchymists, who delved into the secrets of nature with untiring zeal, despite of peril and persecution — feared by the ignorant populace, and denounced by a priesthood often scarcely less ignorant, who stigmatized them as Sorcerers in league with the powers of darkness.

Could one of these ancient sages arise from his grave and enter a modern laboratory with all its wonderful improvements, and work again at forge and crucible, with the old faith, frugality, and patient observation, trust in God and trust in himself, we should not have merely the Midas touch transforming to gold, but we should be meshed in golden tracery, in fillets of amber, showers of gold, and hail-storms of diamonds.

Montgomery Martin, in his work upon Australia, says: "How gold is produced, where it originates, is a mystery. Many of the miners are strongly impressed with the idea that it *grows*, or comes up in yearly crops in Australia. This idea has probably arisen from the observation that some deserted *holes* on being tried again have yielded large returns. One at Forest Creek, when driven a foot or two further than when neglected, was

found to contain, almost in a heap, 20 lbs. weight of gold in *nuggets*. Another hole in the same locality, which miners had abandoned at twenty-one feet deep without seeing a speck, was worked eighteen inches deeper by a fresh party, and a heap weighing 18 lbs. was obtained. Some miners affirm that one or more volcanoes burst forth, and sent out showers of gold instead of cinders, and in confirmation of this theory, they point out the *shot-like* appearance of nuggets, many of which have evidently undergone the action of fire.

"Some suppose that the precious metal is a sort of crystallization, or *growth* in crystalline formation, acting, of course, under regular but unknown laws, and that these places are at this moment producing gold."

This reminds me of a conversation had with Mr. Peal, brother of the distinguished artist of that name, and at that time Superintendent of the United States Mint at Philadelphia. While lecturing in that city I was invited by Mr. Peal to visit the institution. I was not surprised to find in one occupying a position of such trust, a gentleman, scientific and observing; but I found more—he was a quiet enthusiast; and when, in the course of our interview, I expressed my veneration for the old pioneers of science, the Alchemists, his response was so cordially sympathetic that I became interested to know his grounds for belief in them, which I will give in due time.

I shall never forget the strange delight I experienced in lifting the ladle of liquid gold and pouring it aloft—a mass that globuled and rolled upon itself with serpent-like fascination, beautiful exceedingly; translucent opals and diamonds; changing rainbows, and dying dolphins. While thus amusing myself, a square-built, hardy-looking man had entered the place, and laughingly enjoyed my admiration. He had that off-hand, self-sustained manner that characterized the early California gold diggers; men of

enterprise and culture, a sort of revival of the gentlemen of the times of Queen Elizabeth, who came to these shores partly for the love of adventure, and partly in search of gold.

He carried in his hand a bag, which looked insignificant till he dropped it upon a table with a slam that made itself felt. He went on to say :

"I dug this gold in California, and, sir, I want this identical gold, and no other, made into coin; I want a portion made into a bar with no alloy, to bear the date and year of the smelting. I dug it with my own hands, and have a kind of affection for it."

Mr. Peal promised that his wishes should be faithfully regarded. His own gold and no other should be returned to him. After he left I expressed some apprehension that this might be an impossibility, but Mr. Peal assured me that it could be done, and pointed to several small crucibles on the furnace which were then bubbling with gold.

After this followed a discussion upon the possible production of this metal, and I spoke of a specimen brought from the shores of the Pacific, which contained an exquisite form of the long California acorn. It had exactly the appearance of a mould such as artists use for the multiplying of their designs.

How came this impression there? Was the gold in a liquid, boiling state into which the acorn fell, and consumed itself, leaving its impress behind? or was it a chemical compound formed around an acorn which had casually fallen from a tree?—were questions propounded in my suggestive ignorance, to which Mr. Peal replied, with the wisdom of a philosopher and man of science, and just enough of the poet to make him catholic in his faith and large in his receptiveness, in nearly if not quite the following words:

"In her vast subterranean laboratory, Nature combines, filters, evolves; separating simples from compounds, and producing those beautiful results which to us seem mysterious and marvelous, but which will eventually be better under-

stood, and found to consist of the simplest relations. Here, in her secret recesses, chemical heat is evolved, which disrupts mountains and disintegrates rocks, into the seams of which she injects her auriferous treasures. Sometimes this may fall in golden showers; sometimes in golden jets; sometimes in rolling golden lava, into which if any substance, an acorn for instance, chance to fall, its impression is left in the cooling metal.

"I have more than once taken from the crucible more gold than had been put into it, and I have tried, but in vain, to reproduce the effect, or to learn by careful analysis the chemical properties required."

It would thus seem by the language of Mr. Peal, Dr. Draper, and others, that the search for the philosopher's-stone is not yet an exploded endeavor, and the mystic subjection of all matter to legitimate, spiritualistic power is not altogether an extinct belief, as may be gathered from the spiritualistic tendencies of the age acting as a counterpoise to the more rigid scientific materialism of the period. It is thus that a balance is preserved in the search for exact ideas.

Nor is the class of devout mystical believers entirely confined to the past, and it is not a little curious to see habits of thought, which the spirit of the age has superseded, sometimes make their appearance hundreds of years later, in some one of the posterity of a family, just as the black eyes of a remote ancestor are sometimes reproduced in a family where both father and mother are blue-eyed.

It was my fortune to be partially acquainted with Mrs. Mather, the inventor of the sub-marine telescope, whose husband was a lineal descendant of the renowned Cotton Mather, author of the "Magnalia," and an unflinching believer in the occult, and most especially in witchcraft, as did King James, Sir Matthew Hale, and other learned men of the period. Her husband was a marvelous product of Yankeedom, and only to be accounted for on the basis of heredity; a modern Jacob Boehm unproductive of

the infinite suggestiveness of the wonderful Shoemaker of Gorliz.

Mrs. Mather came to me, she said, in consequence of a dream in which her dead husband directed her to find a woman, whom he went on to describe, who had the power, under instruction of superior spirits, to transmute the baser metals into gold. She went to hear me lecture, and declared I was the person described in her dream. The prospect was tempting: the precious metal much to be desired, and not a little needed, but I was more interested in the history of Mr. Mather than in any prospective wealth to accrue to myself.

That Mr. Mather lived quietly in the exercise of his fancies and prophecies, must be imputed to his living in this nineteenth, rather than in the thirteenth century, when he would, most assuredly, have been burned for a Sorcerer; and that he thus lived and thus peacefully passed away was due, also, to the patient, untiring devotion of his devoted wife, who was in the highest degree practical and the most conceivable opposite of himself.

He had a room in his house from floor to ceiling, including both, hung with white linen. Upon the table, covered in like manner, were seven silver candlesticks in which burned candles of pure white wax. After fastings and prayers, arrayed in snowy linen, he entered this chamber sacred to purity and divine communings. Here he passed years of his life, ignoring all human claims, and engaged in abstruse speculations. He was often heard to speak in a loud voice, not in supplication, but in adjuring command.

In one of these periods, he came from his room radiant with smiles, and described a vision in which he had seen the great ocean of the setting sun; there were mines of gold, and rivers flowing over golden sands. He said gold grew, and by chemical tests could be made. All this was twenty or more years before the great discovery of the precious metal on the Pacific slope.

Mrs. Mather brought me several folio volumes upon astrology, once the favorite of Cotton Mather. She was

greatly chagrined at my want of sympathy with her enterprise, and indeed I do not regard it as any merit that I did not co-operate with her, and examine more fully into it. But of one thing I was not unimpressed, and that was the affection amounting to idolatry of this plain matter-of-fact woman for her unearthly husband.

At one time he opened the door of this room and called loudly, "Martha, Martha;" when she came he said, "Take pen and ink and write down what I shall tell you."

She obeyed, and he gave her the day, year, and hour on which he said he would be called out of the world. He then returned to his visions.

Mrs. Mather made a copy of the prophecy, placing the date a year in advance, and like a quaint housewife cut an opening in the paper lining of a trunk, into which she slipped the original. Subsequently, when he asked for the paper, she gave him the false date, which he read without comment. She was ill at ease as the predicted period approached. He was in his ordinary health, even stronger than usual, bright and cheery, talking with his family, when he suddenly fell from his chair in a dead swoon. *It was the hour of the true date.* He never recovered consciousness, and soon expired.

Now here was a man akin in many modes of thought to Jacob Boehm, and Emanuel Swedenborg, both of whom predicted the day of their death. Mrs. Mather believed her husband divinely inspired—a saint and a prophet, which was the more beautiful because the stress of supporting the family, and the inconveniences arising from poverty often pressed heavily upon her. Silas Wright procured the passage of a bill through Congress awarding her ten thousand dollars for her invention, which was a timely relief.

There is no doubt we shall have an age of gold, when diamonds and rubies will be less esteemed than the rose and the lily; but no test will give us finer gold than the affection of this devoted wife.

ELIZABETH OAKES SMITH.