- Dubois: Quoted by Hirt.
 Edinger: Quoted by Adami and Nicholls.
 Ehrlich and Brieger: Quoted by Hirt.
 Frankl-Hochwart: Assoc. Internat. d'Urol., 1908, i.
 Goltz: Quoted by Hirt.
 Guyon: Soc. de Biol., 1900. See also Courtade and Guyon.
 Henle: Quoted by Hirt.
 Hirt: Centralbl. für die Krankheiten der Harn- und Sex.-Org., 1902, xiii.
 Howell: Text-Book of Physiology, 1910.
 Kocher: Quoted by Hirt.
 Landois: Quoted by Hirt.
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 v. Zeissl: Quoted by Hirt.

A BIOGRAPHY OF CHARLES SPON, M.D.*

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CHARLES SPON, the son of Mathieu Spon, and Judith Bernard, his wife, was born at Lyons on Dec. 25, 1609. Little is known as to his early education, neither of his life up to 1620, at which time he was sent to his uncle, Charles Spon, at Ulm. His biographers declare that he was particularly fond of Latin poetry, so that his professors already foresaw in him the ingenious author of the "*Myologia heroica carmine expressa*." His familiarity with the French language, as well as the intellectual midst in which he passed his childhood, undoubtedly contributed to give him his great facility in the study of Latin. However this may be, he preserved during his entire life his great aptitude for this dead language.

He did not remain for any length of time at Ulm, and in 1625 he was in Paris as the disciple of the philosopher, Rodon, whom he left in 1627 to study physics in the Collège de Lizieux. In this institution, which was under the direction of the celebrated Guillaume Mazure, physics and natural sciences were taught under the name of physics. Taking all things into consideration, the preliminary studies in Spon's time were practically the same as they are to-day in the European universities, namely, the study of Latin and letters, philosophy and the natural sciences, only after which could one matriculate in the Faculty of Medicine.

Spon remained at Paris until 1632. He was fortunate enough to study under a coterie of eminent masters. He became especially intimate with Cousinot, who, at that time, had emitted his opinion on the two great medications of the period, namely, diet and bleeding, in the two following works: *Non ergo phlebotomia die critico crisin imminentem remoratur*, Paris, in 4, 1623, and *Ergo dieta plenior securior*, Paris, in 4, 1624. This friendship was of benefit to him inasmuch as when, later on, Cousinot became the first physician to Louis XIV, he obtained letters patent for his former student as quarterly physician to the king. Among other noted men who taught at Paris at this time may be mentioned Pyart, Merlet, Perreau and Charpentier.

* As Guy Patin's letters have long been consulted by both historians and physicians, it was thought that a biography of one of his most constant correspondants, Charles Spon, might be of interest, as little has been published about him. C. G. C.

In 1632 Spon went to Montpellier, where he became on intimate terms with Courtaud, the future adversary of Guy Patin, and with him he admitted the theories of Harvey. After a few months he took the bonnet of doctor and returned to Lyons, but he did not immediately commence to practice there.

His sojourns in Paris and Montpellier revealed to him the rivalry which then existed between the two Faculties, as well as between the theories taught and those who upheld them. This rivalry continued up to the end of the last century and contributed not a little to a wise reserve and a prudent skepticism on the part of the physicians of Lyons. The majority of them, like Spon, had studied at Paris, but, for some unknown reason, most of the degrees were taken at Montpellier, a fact that is made evident when one consults the works published at this time, because one meets, under the name of the author, D.M.M., more frequently than D.M.P.

Although Lyons, at this time, had no university, it possessed, on the other hand, a College of Physicians, whose reputation dated back many years, and although somewhat of a digression, a few words relative to this institution do not seem out of place, and what is to follow regarding it is quoted from Brossette's work entitled, "*Nouvel Éloge de la ville de Lyon*," which was published in 1711.

"The college of medicine of Lyons is illustrious, not alone because of its antiquity, but also on account of several learned physicians who have belonged to it, among which, without speaking of Abascantus, praised by Galen and Andromachus, one may mention during the latter centuries Gui de Chauliac, Simon de Renodis or of Pavia, François Rabelais, Henri Corneille Agrippa, Michel Nostradamus, Joseph Duchesne, known under the name of Quercetan Jacques Daléchamp, Charles and Jacob Spon and several others."

"Physicians who wished to enter this college must give proof of their capacity by public examination, which is carried out with much exactness and severity, so that it frequently happens that certain candidates are refused, although they may have obtained the degree of M.D. from some university. The physicians of Lyons take the title of professor, because they give public lectures on anatomy, surgery and pharmacy. We have several excellent works on medicine as well as on other subjects composed by the physicians of Lyons belonging to the college."

In point of fact, the College of Physicians is not as ancient as Brossette would lead one to believe, its foundation, in all probability, only dating back to 1540. In 1576 this institution was chartered by Henry III, while its statutes were confirmed in 1577. In order to become a member, it was not alone enough to pass the examinations, but the candidate must have shown that he had practiced for two years in some village in the neighborhood of Lyons. Spon, consequently, submitted to the rule and commenced practice at Pont-de-Vesle, a small town situated about a league from Mâcon.

In July, 1635, Spon came to Lyons and, on Aug. 7, in the same year, he was admitted to the learned assembly. It was from the time of his entrance into the College of Physicians that Spon commenced his true career. Favored by a large practice, which later on he confided to his son, Jacob, and one of his nephews, Charles, he received in 1645 letters patent as quarterly physician to the king. This distinction, much more honorary than beneficial in its pecuniary aspects, was accorded him, as we have already said, through the efforts of his former master, Cousinot. The care of his patients did not take up so much of his time as to prevent him from giving up several hours each day to his correspondence and to the publication of his many works which saw the light of day at Lyons. As a bibliophile he also exercised considerable influence.

The certificate of the "bourgeoisie" which the consulate conferred upon him at the commencement of 1639 also contributed to increase his notoriety and facilitated his relations with the celebrities of his time. Above all should be mentioned the friendship which united him to Guy Patin, and it is by the intermediary of the latter that it has been made possible to penetrate a little into the private life of Spon. Spon's wife was greatly admired by Patin; she belonged to a Protestant family for a long time established at Lyons, her maiden name being Marie Seignoret. One of her brothers was a minister of the Reformed Church. She married Spon in 1643.

From 1645 Spon's life continued without any incident worthy of note. However, his nomination to the title of "vice decanus et procurator inelyti collegii medicorum lugdunensium" should be mentioned. The word "vice" is there merely to save appearances, because, being a Protestant, Spon could not be dean, and he did not feel that he could give up his religion simply for the title in full, but it may be said that he fulfilled his functions in a manner satisfactory to all. There exist several letters addressed to him in which he is given the full title of dean.

In spite of all these honors, the latter years of his existence were passed in sadness. His relatives and friends in Germany were ruined by war, while those of his own religion in France were closely watched. His son returned after a long absence in foreign lands, where he had left both his health and his fortune. All these circumstances undoubtedly contributed to hasten his death, the cause of which is unknown, but in a letter written to Abbé Nicaise, his son, Jacob, refers to the death of his father in the following terms: "He died universally regretted by all the good people and mourned by the poor, to whom he never refused his help. Ill for four months, he only took to his bed in the beginning of January. God preserved his mind up to his last breath."

He died on Feb. 21, 1684, as is shown by the following document: "1684, No. 1797. Charles Spon, Doctor of Medicine, died at Lyons on Feb. 21, 1684, and was buried the 22d of the same month at l'hôpital du pont du Rhône, the ordinary cemetery for those of the reformed religion, in

presence of M. M. Brière, Seignoret, and Louis Gérard."

Although this biography is extremely short and undoubtedly far from complete, it is made so simple because only what is authentic of Spon has been given. This distinguished physician certainly played an important part by his writings and correspondence in the medical history of Lyons, as well as by his character and personal qualities.

Although Spon passed his life among savants, he never lost his love for Latin poetry and many admirable verses have been penned by him. In 1636 he commenced to write the maxims found in the Aphorisms of Hippocrates, but having discovered that others before him had had the same end in view, he never published this work. In 1661 he transposed the same author's book on Prognosis into Latin verses, publishing it under the title of "*Sydilla medica*." Another work which had quite a success is his "*Myologia heroica carmine expressa*." This work, upon which he worked during his entire life, would probably never have been printed if his son, Jacob, had not given the manuscript to Leclerc and Manget, and these authors, who published the well-known classical work in two volumes, entitled "*Bibliotheca anatomica*," included this work among others by celebrated men. The work was published at Geneva in 1699.

This poem on the anatomy of the muscles is divided into two parts, the first being an enumeration in hexameters of all the muscles belonging to man, while the details are given in the second part, entitled, "*Musculorum microcosmi origo et inscriptio*," this being divided into twenty-three chapters. In this second part the author adopts the rhythm found in certain of Horace's Odes. As an example, his description of the muscles of the forearm may be given:

Est supinantum radius duplex pars
Longius necnon brevius duplexque
Diga pronantum puta tetragonus
Atque rotundus.
Musculus pronans radius rotundus
Condylus interni interiore ab ora
Brachii surgit mediaque radique
Parte quiescit.

Another work by Spon entitled "*Recueil de constitutions médicales*" contained his experience in the practice of medicine, but the manuscript, which had not been published up to the time of his death, fell into the hands of his son, Jacob, and was lost along with the letters comprising the correspondence of both the father and son.

Spon rendered great service to science by giving his attention to the publication of medical works printed at Lyons, particularly Sennert's letters, the observations of Schenkus, and, above all, Cardano's works. Schenkus, who was professor at Freiburg, and died in 1598, had published his works in the first place at Basle and at Freiburg, respectively, in 1584 and 1597, the whole comprising seven volumes. They were again published

at Frankfurt in 1600 and at Lyons in 1644, under the care of Spon.

As has already been said, he also edited Senner's work. This writer enjoyed a much greater renown than Schenkus. He was born at Breslau in 1572, receiving the degree of doctor at Wittenberg in 1602, and later became professor of medicine at this university. He is supposed to have died in 1637 from the plague. His writings are of particular interest because he was the first to introduce chemistry into medical studies and endeavored to conciliate the principles of Paracelsus with those of Galen. The third author whose works were published by Spon was Cardano. The Lyons' edition, published by Spon, is dated 1663, and has for title: "*Cardani Hieronymi Opera omnia, cura Caroli Sponii Lugduni sumptibus Joannis Antonii Huguetan et Marci Antonii.*"

Lastly is to be mentioned a volume entitled: "*Appendix chimique à la pharmacopée de Lyon.*" This work, which was published under the auspices of the College of Physicians, in 1628, bears no author's name, but a second edition appeared in 1674 under the following title: "*Pharmacopœa Lugdunensis reformatâ mandato et cura incliti collegii medicorum Lugdunensium Lugduni Gallorum MDCLXXIV, Ejusdem collegii sumptibus excusa, typis Jacobi Faeton.*"

The last section of this pharmacopœa is, "*Appendix de medicamentis chymicis,*" and this appendix was written by Spon himself. This appendix was also printed in the first edition, but it consisted of only three short chapters. The fourth chapter, *De calcibus*, etc., was entirely due to Charles Spon.

To give a description of Charles Spon's correspondence and the influence that it had upon medical science of the time would be far too long, although full of interest.

In closing, however, one name among Spon's correspondents which has become almost inseparable with his should be mentioned, viz., Guy Patin. It is most curious to see the physician of Lyons united in friendship with two men who passed their lives in opposing each other as did Courtaud and Patin. The latter, with a mind filled with preconceived ideas and an open enemy to all progress, would hardly appear the sort to be a confidant of a man as liberal as was Charles Spon. Chance had brought them together in Paris and they continued their relations formed there by an active correspondence. The letters of Charles Spon have unfortunately been lost, but Patin's have luckily been preserved. From 1642 to 1664 the latter did not cease to write his friend.

Courtaud was born at Montpellier and received the degree of doctor in 1611. Being the nephew of Heroard, chief physician to Louis XIII, he received letters patent as quarterly physician to the king, but for reasons which need no discussion here he was obliged to sell his position and establish himself at Montpellier. Renowned for his polemics, Courtaud should more particularly be known for the service that he rendered in the teaching of medicine at Lyons, because it was

through him that Charles Spon received his knowledge of the works which appeared at the time and was informed of their good qualities and defects. Courtaud was extremely learned and, consequently, was well placed to instruct Spon in the value of many medical works.

Clinical Department.

A CASE RESEMBLING MYOTONIA OCCURRING IN AN ADULT, DUE TO THE TRICHINA SPIRALIS, WITH THE PATHOLOGICAL FINDINGS IN THE MUSCLES.*

BY ISADOR H. CORIAT, M.D., BOSTON.

THIS case is reported rather fully because of the occurrence in an adult of a symptom-complex which is usually found only in childhood, of certain difficulties in diagnosis and finally of the interesting histological findings.

The patient, a healthy man seventy-one years of age, was referred to me by Dr. Metzger, of Lynn, Mass., for a peculiar stiffness of the leg muscles which interfered with his ability to walk. It is stated that the father of the patient, who was a blacksmith, developed an atrophy of the arm and hand muscles following a period of overwork at his trade, the condition persisting until his death, at the age of seventy-two. This localization of the muscular atrophy is an interesting confirmation of Edinger's theory of over-exertion. It appears, however, that the muscular atrophy in the father was a mere coincidence, as the type of disorder found in the son was distinctly non-hereditary, a pure myopathy, due to a specific infection and not to any atrophy of the motor cells of the spinal cord. Eight years before coming under observation there was a history of a severe gastro-intestinal attack. Shortly afterwards a stiffness was noticed in the right leg, followed by a weakness of the muscles of the right foot. Finally, the left leg and foot were likewise affected. There was usually no difficulty in starting to walk, but after a short time, or in excessive fatigue, there arose a sensation of tightening in the calf muscles which made further walking impossible. A short rest, however, restored the contractile ability of the muscles. In bicycle riding the same difficulty took place; he was able to go only a short distance, when further pedalling became impossible.

The neurological examination showed the following. The calf muscles were thin and flabby, the measurement for the right calf being 29 cm., for the left calf 30 cm. Occasional fibrillary twitchings were noticed in these atrophied muscles. The foot could be extended and flexed rapidly and easily, but after a few minutes these movements became slower and more difficult and then almost ceased, the calf muscles at the same time becoming hard and rigid. After walking a few steps the gait became stiff and the phenomenon of rigidity of the calf muscles was again found to take place. This rigidity disappeared in about a minute after the contractions had ceased. There was no difficulty in starting to walk or in the initiative voluntary movements. He could also arise quickly from a sitting posture. There was no overdevelopment or hypertrophy of the musculature. The bladder and rectum, the muscular movements of the upper extremity, the facial muscles,

* Read before the Mt. Sinai Hospital Clinical Society, Oct. 13, 1910.