

HISTORICAL NOTES ON RESUSCITATION.

The first recorded cases of resuscitating the apparently drowned are mentioned in the notes to "Derham's Physico-Theology" as having occurred at Troningsholm and Oxford about the year 1650. In the year 1745 Dr. J. Fothergill read a paper on the subject before the Royal Society. It dealt with the recovery of a man, dead in appearance, having his lungs distended by Mr. William Tossack, Surgeon in Alloa, in 1744.

In the year 1767, M. Réaumur reported several cases of resuscitation which he had been able to effect in Switzerland, and shortly after a Society was formed at Amsterdam for the recovery of the apparently drowned, and to instruct the common people as to the best manner of treating them when rescued, and to reward the people for their services.

In 1773, Mr. A. Johnson, M.D., suggested the formation of a similar Society in England, and Dr. Cogan translated the memoirs of the Amsterdam Society. Dr. Hawes secured a copy, and tried to form a Society. There was, however, a strong prejudice against the idea, but he publicly offered rewards to persons who, between Westminster and London Bridges, should rescue drowning persons and bring them to certain places on shore in order that resuscitation might be attempted. In this way he was instrumental in the saving of several lives, and paid the rewards out of his own pocket, until his zeal brought him sympathy, and the Royal Humane Society was founded. This was in the year 1774. The system then in vogue of inducing artificial respiration was by inserting the pipe of a pair of bellows into one nostril and closing the other. Air was forced into the lungs and then expelled by pressing the chest, thus imitating respiration. Dr. Hawes used for his resuscitation work a kind of cradle, in which the subject was placed, and then raised over a furnace. Bleeding, holding up by

the heels, rolling on casks, etc., were at various times resorted to.

In 1891 a person was restored in Australia by being held over a smoky fire, which is a native method of restoring life; while a few years back, at a riverside town, a patient was saved by the placing of a handkerchief over his mouth and the alternate blowing into and drawing air out of his lungs until natural breathing was restored.

The oldest of the present-day methods is the one introduced by Dr. Marshall-Hall in 1856. It consists in rolling the patient from the side to face downwards, and applying pressure between the shoulder blades. This rolling is continued at the rate of about 15 times a minute. Dr. Silvester's method was introduced in 1857. In this method the patient is laid upon his back and the arms are pulled up above the head, then folded and pressed against the sides of the chest. When the arms are pulled up above the head the chest is inflated, and when pressed against the side it is deflated.

In 1869, Dr. Howard propounded another method, which also requires the patient being laid upon his back, the pressure being applied by the hands against the lower ribs, thus causing the air to be expelled from the lungs. When the pressure is released the air re-enters.

The subject of resuscitation has also received considerable attention in various parts of the world. In Germany, in 1869, Dr. Schultz suggested a plan; in 1871 Dr. Paaschs brought forward another; and in 1879 Dr. Schuller a third, while in 1893 Dr. Djelitzen experimented on the same subject in Sweden, and many other medical men have also made it a matter of much study. A digest of their conclusions, together with suggestions for a modified Silvester method, was published at Upsala, Sweden, in 1905, by K. G. Ploman, a medical student of the University.

In 1903, after many years of investigation, Professor E. A. Schäfer, F.R.S., published the results of his researches on the relative efficiency of the existing methods

of performing artificial respiration in man, and described a new method for effecting this purpose. Professor Schäfer's method has now been adopted by the Royal Life Saving Society, because of its simplicity, and because the patient is laid face downward, thus avoiding the necessity of attending to the tongue, always a difficult operation. The face downwards position not only ensures the falling forward of the tongue, but also facilitates escape of mucus and fluid from the throat and mouth by natural gravitation, and prevents waste of valuable time, which would be otherwise occupied in preliminary operations, and would delay the commencement of artificial respiration.

Professor Schäfer was born in London in 1850, and is now professor of physiology at the Edinburgh University; he was general secretary of the British Association from 1895 to 1900, took the Baly medal of the College of Physicians in 1897, and was awarded the Royal medal by the Royal Society in 1902. He has written several standard works on Histology and Physiology; several of his papers have appeared in the "Transactions of the Royal Society," the "Journal of Physiology," and elsewhere. He has also rendered the Society invaluable service by supervising and correcting all the details of his method as produced in this Handbook.