

SOME PRACTICAL POST-MORTEM POINTS.

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1. GET all the anatomical knowledge you can out of every autopsy you make. It is, therefore, usually advisable, especially in the case of females, to perform a preliminary laparotomy. Many surgical operations can be practised upon the body without disfigurement, such as Alexander's operation, oöphorectomy, removal of the ear ossicles and vermiform appendix, stretching of the sciatic nerve, symphyseotomy, etc.

2. Do not forget to dictate the post-mortem notes while the autopsy is in progress.

3. Respect the feelings of the friends in every possible manner, and always return everything in a private house to its proper place. Be sure to leave no blood-marks behind.

4. Be sure you have a legal right to make the post-mortem before you begin. The nearest relative, or the one who is going to pay the expenses of the funeral, should give the consent in writing.

5. Do not take away more tissue from a post-mortem than you are able to thoroughly work up.

6. Try to encourage a demand among the laity for the performance of autopsies.

7. In making an autopsy have a regular method for its performance, which is only to be modified by exceptional circumstances. Finish the examination of each organ in as thorough a manner as possible before the examination of another organ is commenced.

8. Label all your specimens at once with the name of the person from whom the specimen is removed, character of the specimen and relations in the body, date, and preservative fluid employed.

9. If you are so unfortunate as to cut yourself, wash the wound



with running water for four or five minutes, and then dress antiseptically. Do not, out of bravado, go on with the post-mortem, if there be anyone else present who can complete it.

10. If you are not making the autopsy yourself, do not be too forward in making suggestions to the one who is making it; but always be ready to do anything that you are asked to do in connection with the autopsy.

11. Let your medical friends enjoy the autopsy and specimens with you.

12. Get all the posts you can; never refuse to make an autopsy for another, when you possibly can.

13. Tact will get you many autopsies; curiosity of relatives and friends can often be worked upon to get permission for an autopsy.

14. As the object of the autopsy is usually to find out the cause of death, either for legal or scientific purposes, the post-mortem should, therefore, be conducted in as thorough and accurate a manner as possible.

15. In legal cases be sure to protect yourself in every possible way. The jars (which should never have been used) containing the specimens should be sealed in the presence of a witness. In important cases here in Philadelphia, the Coroner has both of his physicians present at the autopsy, so that the testimony is stronger; and in case of absence of one of the physicians the other can go on the witness stand and the case not be postponed.

16. If you value your peace of mind do not put yourself forward as an expert witness in medico-legal matters. Knowledge which you already have should be freely given to the court in criminal cases, but the court cannot compel you to obtain expert knowledge without your consent.

17. In Germany the legal evidence of a post-mortem held by gas-light has been judged by the court, except under certain peculiar circumstances, to be void.

18. If two persons are lifting the body the lightest weight is at the feet.

19. Chloroform, when placed on a towel and the head enveloped in the towel, will quickly dispose of *pediculi capitis*.

20. Many signs of inflammation, especially of the mucous membrane, disappear after death. Remember that red flannel often colors the skin red.

21. Make the undertaker your friend. Do not recommend an undertaker who disapproves of post-mortems.

22. It is a good knife that will keep its edge in more than one post-mortem.

23. Do not jump at conclusions too quickly. Tentative diagnoses alone should be made until the post-mortem is complete.

24. Always weigh the important organs, and have some method by which you can tell the right from the left organ in case of the double ones. One nick in the left-sided organs and two in the right will readily distinguish them.

25. Wash your hands frequently during the performance of an autopsy so as not to allow the blood to dry on the skin.

26. In opening a cystic kidney be careful that the liquid does not injure the eyes or soil the linen, as when the kidney is opened the liquid in the cyst is under pressure and may squirt several feet.

27. A duct can often be easily followed by making a nick in it, and then introducing a piece of broom stick or a grooved director in the direction you desire to dissect. This is especially useful in the ureters and the ductus choledochus communis.

28. In writing the account of an autopsy describe what you see; do not use names of diseased conditions. These should be put in under the head of pathological diagnoses.

29. Urine, or aromatic spirit of ammonia will best take off the odor from your hands. This odor is usually gotten from opening the intestines.

30. Ammonia (also the aromatic spirit) will remove iodine stains; a weak solution of the hypobromite solution will remove carbo-fuchsin and other aniline stains from the hands.

31. Any organ which you desire to save should be placed in a safe place so that it will not be returned to the body and sewed up.

32. The dissecting-room is a poor place in which to study pathology, on account of the chloride of zinc forming with albumin an insoluble albuminate of zinc.

33. Nervous tissue for microscopic study should not be placed in zinc chloride or in alcohol.

34. Remember that a post-mortem, with the exception of the brain and cord, can be made with a penknife.

35. Remember that the thoracic and abdominal organs can be removed by the rectum or the vagina.

36. Before removing the calvarium have a basin so placed that it will receive the blood and cerebro-spinal fluid.

37. Drawings, photographs, casts, cultures of micro-organisms, and

microscopic slides are valuable additions to a well-written account of an autopsy.

38. A lesion in one part of the body will often suggest a careful search for a lesion in another part of the body.

39. Do not mistake the normal for the abnormal.

40. Squeezing the gall-bladder after the duodenum has been laid open, will often cause bile to pass out, and the papilla, the ending of the common bile-duct, can thus be demonstrated.

41. Remember that frozen sections of fresh tissue can be cut and mounted in a half-hour to an hour.

42. Three hours is none too long in which to make a complete autopsy.

43. Be careful that the first rib does not scratch your hands when removing the tissues in that region. Therefore cover over the cut ends of the clavicle and ribs with the skin flaps.

44. Blood makes a good glue for affixing labels, and the blood of a person dying from hydrocyanic-acid poisoning makes a most excellent red ink which will keep for years without the addition of any preservative fluid.

45. Remember that after the brain has been removed the fundus of the eyes can be excised by a circular incision posteriorly, without disfigurement. The cavity should then be stuffed with dark-colored wool or cloth.

46. In private cases your skill as a pathologist will be frequently judged of by the neatness with which you sew up the body.

47. If you discover suspicious lesions always stop the post-mortem and report the case at once to the Coroner.

48. Remember that in warm weather the intestines are especially liable to undergo rapid decomposition when exposed to the air.

49. Remember that a railway train or cart may pass over the body and there be no abrasion in the skin more than a brush burn.

50. Remember that the color of organs is frequently changed when exposed to the air by the oxidation of the hæmoglobin. Also that the sulphide of iron frequently discolors organs after death, due to the sulphuretted hydrogen during decomposition precipitating the iron of the hæmoglobin.

51. The clavicle can be grasped and moved and the claviculo-sternal articulation thus readily discovered.

52. In removing the spinal cord the following method may be used without disfigurement to the skin of the back part of the neck. Make a circular incision from the middle of the trapezius muscle of the one

side to the middle of the same muscle of the other side, using as the centre of the circle the external occipital protuberance. This will take you in the median line to about the second dorsal vertebra; then dissect away the skin with the muscles attached, and elevate this flap with a tenaculum and draw the shoulders backward. A sufficient amount of space will be then given to remove the cord in the usual manner.

53. If the rectus muscle on each side be cut near its origin, in the direction of Poupart's ligament, the abdominal cavity will be much more thoroughly exposed to view than in the ordinary manner. First, however, examine with the finger for hernia.

54. And lastly, be honest. Everyone diagnoses lesions during life which are not found at the post-mortem. Even after a most careful post-mortem it is often impossible to tell from what the patient died.

DISCUSSION.

DR. G. BETTON MASSEY: This paper shows that the art of one who makes post-mortems is something of a specialty, a matter which I have often thought was true, and hence, not being a specialist in that direction, I have allowed some opportunities for scientific study to escape me. That we should use the services of the specialist in cases requiring autopsy I am convinced, but the question arises as to how we can arrange to thus serve science in these cases. Who is to pay to have the work done properly? There are few physicians who would be willing to go into their own pockets to pay for the services of a specialist in this final act in the drama of life. It occurs to me that such work might be done by this Society if it had sufficient capital. The members might have some arrangement by which they could call upon an official postmortem-maker of the Society for his co-operation, either free or at a small expense, in accordance with the case. Such a service would be of far more importance than that of the mere microscopist, which many societies have. I doubt if work with the microscope alone is attended with such possibilities as lie in the hands of the all-around pathologist.

