

pane, in a very bad-risk patient. The second death on the table was in an elderly woman of 62, who had a fractured neck of femur, for which a Smith-Petersen pin was being inserted. Shortly after the reduction of the fracture this patient became an ashen-grey colour, and remained so throughout the operation, which lasted forty minutes. Her condition did not improve despite the fact that her respirations were ample, and the oxygen content of the mixture was kept high. Just as the operation was being finished she died. It seems as if death in this case was due to an embolic infarct in the pulmonary artery. . . . In midwifery, cyclopropane has no rival." 18 references.

J. C. M. C.

KRANTZ, J. C., JR.; CARR, JELLEFF;
EVANS, W. E., JR., AND MUSSER,
RUTH: *Anesthesia. XXII. The Anesthetic Action of Isopropyl Methyl Ether. J. Pharmacol. & Exper. Therap.* 87: 132-137 (June) 1946.

"In a former communication to this journal the authors demonstrated the availability of n-propyl methyl ether as an anesthetic. Since that time more than one hundred successful clinical anesthetics have been conducted with n-propyl methyl ether. A clinical study of anesthesia under n-propyl methyl ether has been recorded elsewhere. Accordingly it occurred to us to study the anesthetic properties of another isomer of ethyl ether, namely, isopropyl methyl ether. . . . Isopropyl methyl ether, an isomer of ethyl ether, is a volatile liquid exhibiting anesthetic properties when administered by inhalation to various species of animals. The potency of isopropyl methyl ether is approximately 25 per cent less than that of ethyl ether. In the dog, isopropyl methyl ether anesthesia produces no functional liver damage as

shown by the bromsulfalein test. In . . . experiments in the rat, dog and monkey, anesthetics with isopropyl methyl ether produced no histopathological changes in the liver and kidneys. Neither the monkey's nor the dog's heart showed any significant electrocardiographic changes under anesthesia with isopropyl methyl ether. The blood pressure of the dog remains essentially unaltered under anesthesia with isopropyl methyl ether.

"This isomer of ethyl ether compares favorably with ether as an inhalation anesthetic in several species of animals. Its increased volatility appears to compensate for its diminished potency. This first approximation of the anesthetic properties of isopropyl methyl ether, in our opinion, warrants its careful and judicious trial in man by skilled anesthetists. Extensive and intensive study alone in human anesthesia will reveal whether or not this mixed ether will warrant a place in the armamentarium of the anesthetist. . . . These experiments having been completed, we deemed that the properties of isopropyl methyl ether warranted its trial as an anesthetic in man. On March 22, at 4:00 p.m., one of us (J. C. K., Jr.) administered isopropyl methyl ether to an anesthetist, Constance Black, by the open drop method. The induction period was about 5 minutes. Light anesthesia was continued for 3 minutes. The recovery was rapid and uneventful. The induction period was not marked by any excitement." 8 references.

J. C. M. C.

GRUBER, C. M., AND KEYSER, GOLDIE F.: *The Response of the Isolated Frog Heart to Different Barbiturates. J. Pharmacol. & Exper. Therap.* 87: 104-108 (June) 1946.

"Although Roth noted the effects of certain barbiturates on the excised