



"THE APOTHEOSIS OF QUACKERY"

That's what the editor of *JAMA* called Doc Brinkley. Still, thousands of men lined up for his rejuvenation operation

By John L. Baeke, M.D., and Lynn Payer

According to John R. Brinkley's official biographers, the idea that goat testicles could be used to rejuvenate men combined brilliant insight with barnyard common sense. When one of Brinkley's neighbors in Milford, Kansas, one farmer Stittsworth, complained of impotence, Brinkley jokingly told him, "You wouldn't have any trouble if you had a pair of those buck glands in you." Mr. Stittsworth's reply was, "Well, why don't you put 'em in? Transplant 'em. Graft 'em on."

On November 22, 1917, "Doc" Brinkley did just that, and two weeks later Stittsworth claimed to be realizing "in all ways" the spunk of a lad 20 years his junior. Ten

months later, his wife became pregnant. They named their son Billy.

Brinkley was thus launched on a series of successes that would make him a millionaire during the Great Depression, owner of the most powerful radio station in the history of the world, and admiral of the "Kansas Navy." He would have won the Kansas governorship on a write-in campaign had so many legitimate ballots not been unfairly disqualified.

His efforts at self-promotion were so outrageous they inspired regulations of medical advertising and of the radio waves that are still in force today. Morris Fishbein, M.D., the late editor of *JAMA*,

called him, among other things in a vitriolic exchange between the two that lasted for some 20 years, "the apotheosis of quackery."

In 1977, Dr. Brinkley's widow, Minnie Brinkley, M.D., made Doc's papers available to the Kansas State Historical Society. They make it clear that Brinkley was more than a mere barnyard genius — as he claimed — and cast doubts on whether he could rightly be called a quack. They showed that Brinkley was quite aware of what legitimate endocrinologists around the world were doing at the time and that his work fit in with theirs. In any case, Brinkley was the most flamboyant, richest, and perhaps least ethical practitioner of the art of goat-gland transplantation.

18,000 Goat Glands

Brinkley was not an M.D., although he had three years of legitimate medical training from Bennett Medical College (later Loyola University) in Chicago and a degree from the Eclectic Medical University of Kansas City, Missouri, in 1915. Following his studies, he worked briefly at the Swift & Company Meat processing plant in Kansas City, where he claimed to have learned that the goat was the healthiest of all animals. In 1917, the Brinkleys headed to Milford, Kansas, a tiny town of 100 they were to put on the map.

For a while, Brinkley operated a typical general surgery-family practice. Patients admitted to the 30-bed Brinkley Hospital had their tonsils, ovaries, adenoids, hemorrhoids, and appendices out or were treated for influenza, pleurisy, and peritonitis. But, by 1920, patients — admitted with the same array of chief complaints as before — in addition to the usual surgical or medical treatment, almost uniformly received the Brinkley gland operation, varyingly referred to in the hospital logs as the

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World Wide Photos/The Kansas State Historical Society

"Double Transplantation," "the Treatment," the "Brinkley Operation," the "Compound Operation," the "Steinach Operation," or simply with just ditto marks.

Word of Brinkley's operation quickly spread beyond Milford, and on March 26, 1920, Doc implanted the glands from a two-month old Toggenberg goat into the ailing 71-year-old chancellor of the University of Chicago Law School, J.J. Tobias. Some months later, a press photographer snapped the rejuvenated chancellor clicking his heels in midair. The photograph was reprinted coast to coast, in some cases above the news of the passage of the women's suffrage amendment.

Brinkley's medical practice took on a cosmopolitan flavor as the wealthy and famous sought him out. The \$750 price tag for two goat glands or \$5,000 for a pair of genuine human glands (from death row prisoners) soon became a status symbol. Harry Chandler, founder of the *Los Angeles Times*, became a proud recipient and brought Brinkley to California to treat some of his famous friends. Another recipient (probably) was Vice-President Charles D. Curtis (from Kansas). Woodrow Wilson

was rumored to have received the Brinkley operation, but the president was actually rejected, according to Mrs. Brinkley.

Doc became so rich that he wore diamonds as large as grapes, had one of his many Cadillacs gold plated with "Doctor Brinkley" in at least 14 places, and owned two yachts — the "Kansas Navy" — so large that he eventually sold them to Her Majesty's Royal Navy.

By the late 1930s, Brinkley proclaimed to have successfully implanted more than 18,000 goat glands for such varied problems as varicose veins, hydroceles, hemorrhoids, hernias, premature ejaculation, neurasthenia, poor vision, acne vulgaris, influenza, youthful overindulgences, dizzy spells, and melancholia. He later added eczema and other skin diseases, loss of hearing, lumbago, sciatica, and constipation to the list. "Soon laws will be passed making it a crime for people to be chronically ill," Brinkley once predicted. He appealed to the asymptomatic male: "Nary was there a man alive who was not in need of the Brinkley Operation." He also flattered his potential patients by claiming that his operation was most adapted to the intelligent and



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Doc Brinkley, opposite, at the microphone of KFKB, was an early media maven. He promoted his tonics as remedies to listeners' ailments, creating a pharmaceutical empire. A cartoon from a Topeka tabloid expresses some skepticism about Brinkley's political ambitions and medical practices.

not sterilization but reduction in prostate size and proliferation of Leydig's cells. While Brinkley sometimes denied that he was performing the "Steinach Operation," credit for this part of the operation must go to Dr. Eugen Steinach of Vienna.

Steinach's theory was that ligation of the vas or ductuli efferentes resulted in congestion of fluid in the vas and ducti, which led to increased pressure against the external secretory Sertoli's cells. Loss of these generative elements provided the additional space that allowed for a compensatory proliferation of the "life-giving, energizing, vitalizing" interstitial Leydig's cells. Steinach found that senile rats when ligated developed thicker fur, increased appetite, a new padding of fat, and improved circulation to such previously anemic internal organs as intestine and mesentery. Senile changes of the cornea disappeared, mental alertness and inquisitiveness reappeared, behavior turned spirited—often combative—and muscle strength increased. There was, of course, renewed sexual interest. After undergoing this phase of the operation, one rat performed coitus 19 times in 15 minutes.

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least suited to the "stupid type."

Just what was the Brinkley "Four-phase Compound Operation," which, in Brinkley's inimitable prose, was "compound in technique and . . . compound in results"? As Brinkley described it: "We have transplanted the right sort of gland from the right sort of animal in the right place and in the right manner, and we have safeguarded its energy."

Brinkley described the four phases as injection of the seminal vesicles through the vas deferens with Mercurochrome solution; removal of the vas deferens, either unilaterally or bilaterally; taking a portion of muscle or fascial tissue

in the scrotum containing an artery and a nerve and suturing it into the epididymis or the testicle; and implanting goat gland tissue underneath the covering of the epididymis or in the testicle.

Phase One, the injection of the seminal vesicles with Mercurochrome, although not widely practiced, was an accepted procedure at the time in the treatment of prostatitis as well as seminal vesiculitis. When the Mercurochrome reached the seminal vesicle under pressure, it was able to come into contact with the infected prostate.

The primary object of Phase Two, vasectomy with removal of as many inches of the vas as possible, was

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Phase Three was the one that got Doc into the most trouble: It was the only one that could not be defended by the medical literature of the day. It consisted of locating a small artery in the scrotal fascia, dissecting away the muscle tissue surrounding it, and suturing it onto the epididymis. The goal of the procedure was to ensure blood and nerve supply to the transplanted gland. When Brinkley was later asked where he had learned this technique, he replied: "I learned it in experimental surgery."

In the last phase, the actual gland transplantation, Brinkley originally transplanted entire goat testicles sliced in half, but then switched to wafers and finally to pellets of testicular tissue. Most frequently, they were transplanted into the sinus of epididymis, but sometimes Brinkley put them in the rectus abdominis muscle, the thigh, the inguinal canal, or the testicle. He also occasionally implanted goat glands into the vagina. Brinkley used only the Toggenburg breed of Swiss goats, since all other species of goats, it seems, carried a persistent odor that would be transferred with the goat's glands to the human being. This would "make his neighborhood unpleasant," as Brinkley put it.

Phase Four was what caught the popular imagination, but it was actually reasonably medically respectable at the time. Steinach had shown around 1894 that castrated rats implanted with testicles taken from normal littermates developed normally and that when testicles were implanted into aging rats they showed improved appetite, slept less, were much more active, and soon exhibited renewed interest in female rats in estrus. The testicles revealed a well-documented increase in Leydig cell count and cell size. Life expectancy increased from 25 to 28 months to around 36 to 38 months. Ten years later, Dr. Serge Voronoff of the College de France, transplanted testicles into goats and rams and, finally, into 43 men. He wrote, "I have no doubt that in animals, at any rate, testicular grafts can actually prolong life." They were joined by other physi-



AP/Wide World Photos

cians—such as Max Thorek, surgeon-in-chief of the American Hospital, Chicago—who used gland transplants to treat everything from hardening of the arteries to epilepsy.

Although much of the public criticism of Brinkley centered around the goat-gland operation, what probably got him into more trouble with the AMA and the Kansas Medical Society was his radio prescribing. Around 1920, Doc applied for a radio station, ostensibly to entertain patients during their convalescence, and the FRC (now the FCC) had granted him an incredible 1,000 watts. KFKB (Kansas First, Kansas Best) featured live comedy, musical per-

Why is this man smiling? Brinkley's Midas touch faltered after losing the libel suit against Dr. Fishbein. Brinkley, with his attorney, filed bankruptcy in Del Rio, Texas, after transferring his wealth to his son.

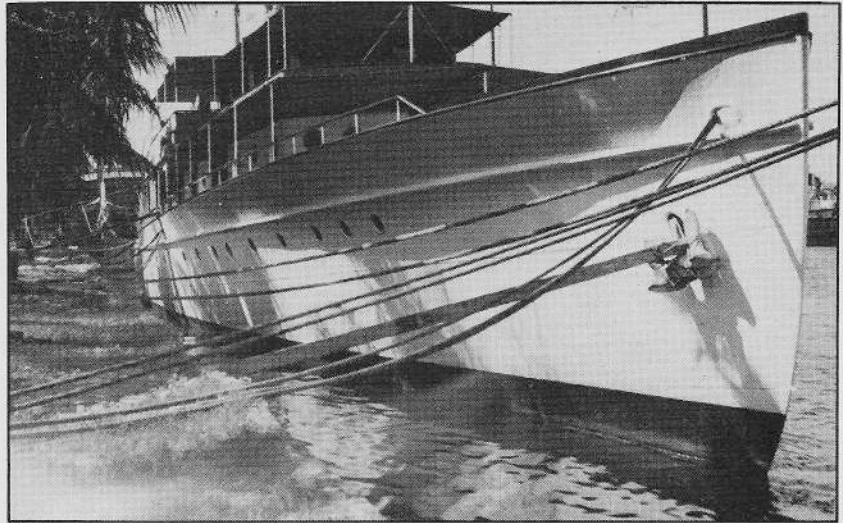
formances, gospel preaching, poetry readings, news, and hours of Doc speaking on his philosophies of life and death, politics, and the Brinkley Compound Operation.

He also featured the "Medical Question Box" show, aired several times a day, during which letters from listeners in need would be read over the air. For example: "Here's one from Tillie. She says she had an operation, had some trouble 10 years ago. I think the operation was unnecessary, and it isn't very good sense to have an ovary removed with the expectation of motherhood resulting therefrom. My advice to you is to use Women's Tonic Numbers 50, 67, and 61. This combination will do for you what you desire, if any combination will, after three months' persistent use."

Brinkley had organized an extensive network of drugstores, especially throughout the five-state Midwest. Through these, his exclusive line of Brinkley pharmaceuticals—numbered one through 95 and found upon chemical analysis to be dilutions of indigo—could be purchased. Most ampules cost two dollars, half of which went to Brinkley himself. He explained that this was simply to cover broadcasting costs.

The pharmaceutical portion of the Brinkley empire is known to have grossed as much as \$400,000 a year, bringing Brinkley's annual Depression income to more than \$1 million. In addition, every patient leaving the Brinkley Hospital with a pair of goat glands was discharged with five maintenance ampules costing \$100.

By 1930, the AMA and the Kansas Medical Society had KFKB's license revoked. But, while Brinkley liked to paint himself as victim-martyr in the same category as Galileo, Daniel, and even Jesus of Nazareth, he quickly took the upper hand: Within a matter of months, Doc purchased station XERA, located immediately across the border in Villa Acuña, Mexico. The station, from which Brinkley broadcast via long-distance telephone from Milford, reached a million watts of power, the most powerful the world has



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ever known. It reached listeners in Alaska, South America, and sometimes even Hong Kong. The AMA and KMS then started working on revoking Brinkley's license to practice medicine.

In September, 1930, Brinkley decided to run for governor of Kansas on a platform that included a lake in every county and deregulation, particularly of bodies such as the Kansas Medical Society. Having missed the registration date, he ran as a write-in candidate, using his radio station to promote himself. He therefore became the first person to use the airways for a political campaign. He also had a road show that foreshadowed modern political campaigns, complete with gospel singers and cheerleaders dressed as nurses. Brinkley lost by some 34,000 votes, because opposition party workers were able to reject some 50,000 Brinkley votes on the grounds that they were spelled incorrectly. He even carried four counties of Oklahoma. To this day, he still receives a few write-ins in Kansas elections.

The FCC passed regulations outlawing remote broadcasts across international borders in 1931, and the Kansas Medical Society revoked Doc's license to practice medicine. Doc and Minnie closed the Brinkley hospital in Milford and moved the operation to Del Rio, Texas, just across the Rio Grande from Villa Acuña, from

Brinkley's wealth was conspicuously displayed in diamond jewelry, gold Cadillacs, and enormous yachts. The "Kansas Navy" was eventually sold to Her Majesty's Royal Navy.

where he could broadcast directly. Here, he would make another fortune.

By the late 1930s, Doc's fortunes were on the decline. In 1939, he lost a \$600,000 libel suit brought against Dr. Fishbein for Fishbein's article "Modern Medical Charlatans" in *Hygeia*. Texas moved to revoke his license to practice medicine, and Doc and Minnie relocated in Arkansas in 1940. But, by then, another regulatory agency, the Internal Revenue Service, was after him. He declared bankruptcy, transferring his fortune to his son Johnny Boy. Brinkley died of a heart attack on May 26, 1942, at the age of 56. His last words were: "If Dr. Fishbein goes to heaven, I want to go the other way." □