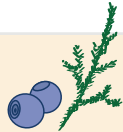


# Bedwetting Treatments Through the Ages

HISTORY OF BEDWETTING TREATMENTS

1550 BC

The earliest record of enuresis in literature is in the Papyrus Ebers, an ancient Egyptian medical document. It suggested a mixture of juniper berries, cypress leaves, and beer as a cure.



77 AD

During the 1st century, Gaius Plinius Secundus, or better known as Pliny the Elder, a Roman writer and philosopher, recommended that children eat boiled mice with their food.



1600s

1642



Bits of pig bladder sprinkled onto the child's bed.

1700s

1709

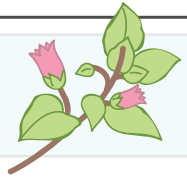


Forced to drink urine for wetting the bed.

1800s

19th - 20th Century

Belladonna used to temporarily "paralyze" the bladder muscles.



1900s

1950

1870



Collodion applied to tip of penis. The child had to rip out the "cork" when he needed to urinate.

1902

Small dilator used to rub silver nitrate onto the urethral canal of bedwetting girls. Popular bedwetting treatment in the late 1800s through mid-1900s.

1956



Dr. Gordon Ambrose suggested using hypnotherapy, or hypnosis, to treat bedwetting children.

## TREATMENTS IN CULTURES

UT

NAVAHO TERRITORY

CO

1947



Navaho tribe believed that children would not "soil" the nest, if they stood naked over a burning bird's nest.

1881



Two sponges are connected by a battery, and when sponges become wet, alarm sounded.

1904



The first "bell & pad" alarm was created by Dr. Meinhard Pfaundler, a German physician, who placed a urine-sensitive pad, made of a zinc-copper plated iron, under the child's bottom.

1979



Dr. Hilal Malem created the first body-worn alarm for general use. Malem Medical is now the world's largest bedwetting alarm manufacturer.

Pre-1970s



In Nigeria, frogs were tied to a child's penis, so that the loud croak would scare the child from urinating.

AFRICA

1925

In the early 1920s, doctors began using posterior pituitary snuff, powder that is inhaled through the nose.

1989



Desmopressin acetate (DDAVP), a man-made form of vasopressin, approved by FDA for bedwetting treatment. Given as a nasal spray, and then in 1998, as a tablet.

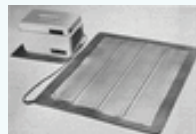
In 2007 nasal spray received Black Box warning after hyponatremic seizures.

1938



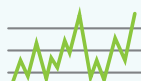
West African people would pour ashes and water onto the child's head.

1938



Hobart and Mowrer are credited for the first "bell & pad" alarm in the U.S. Similar to Pfaundler's model, an alarm sounded when urine closed the circuit on the bronze mesh screen.

1999



Japanese urologist and a telephone maker created a \$1.5 million electronic alarm that measured a sleeping child's brainwaves and monitored the bladder with a stethoscope-like tool to sense when the child is about to urinate.

Bedwetting Store™

www.bedwettingstore.com  
1-800-214-9605

**Sources:** Glicklich, L. (1951). Special Reviews: An Historical Account of Enuresis. *Journal of the American Academy of Pediatrics*. (8)6: 859-876 • Gill, D. (1994). Enuresis through the Ages. *Journal of Pediatric Nephrology*. 9: 120-122 • Wright, L.B. & Tinling, M. (1963). *The Great American Gentleman: William Byrd of Westover in Virginia: His Secret Diary for the Years 1709-1712*. New York: G. P. Putnam's Sons. Retrieved August 30, 2012, from <http://www.babel.hathitrust.org/> • Schultheiss, Dirk (2000). A Brief History of Urinary Incontinence and its Treatment. *Incontinence: Basics & Evaluation*. 1. Paris, Health Publications, 19-34. • Salmon, Michael A. (1974). An Historical Account of Nocturnal Enuresis and its Treatment. *Journal of the Royal Society of Medicine*. (1975) 68(7): 443-445 • Parnell, G.C. (Jan. 11, 1902). A Suggestion for the Treatment of Enuresis in Females. *The British Medical Journal*, 1, 72. Published by: BMJ Publishing Group. Article Stable URL: <http://www.jstor.org/stable/20270832> • Pfaundler, H.M. (1904). Demonstration eines Apparates zur selbsttatigen Signalisierung stattgehabter Bettnassung. • Marson, F.G.W. (May 14, 1955). Posterior Pituitary Snuff Treatment of Nocturnal Enuresis. *The British Medical Journal*, 1, 1194-1195. Published by: BMJ Publishing Group. Article Stable URL: <http://www.jstor.org/stable/20363561> • Forsythe, W.I. & Butler, R.J. (1989). Fifty years of enuretic alarms. *Archives of Disease in Childhood*. 64: 879-885 • Ambrose, G. (1983). Hypnotherapy for enuresis. *Journal of the Royal Society of Medicine*. 76(12): 1080 • Houts, Arthur C. (1999). Commentary: Treatments for Enuresis: Criteria, Mechanisms, and Health Care Policy. *Journal of Pediatric Psychology*. (2000) 25(4): 219-224 Yamaguchi, M. (1999, April 20). Machine lets beds stay dry. *The Spokesman-Review*, p. A4