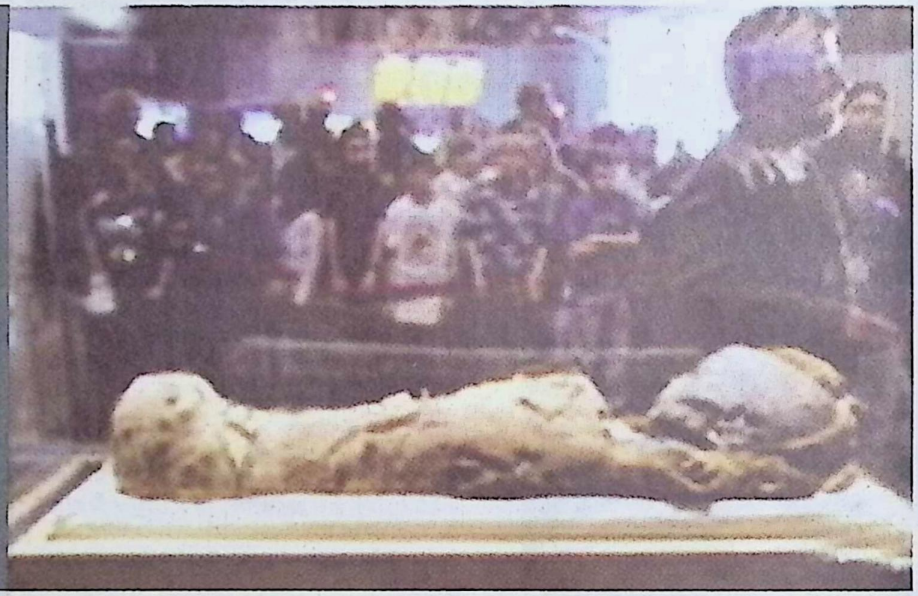
Modern Technology Reveals Baby Mummy's Past



By Cheryl Wittenauer
Associated Press

THE baby mummy had a European mom, and likely came from a wealthy family. But where he lived and why he died and at such a young age remain a mystery. The mummy, exhibited for the first time Thursday at the Saint Louis Science Center, has been the year-long focus of an international team of investigators. The museum said it may be the most extensive research project ever undertaken on a child mummy.

Acquired by a Hermann, Mo., dentist at the turn of the century in the Middle East, the mummy ended up in an attic of some of his relatives, before being donated to the Science Center in 1985.

It sat in a museum warehouse until Al Wiman joined the Science Center as vice president two years ago and suggested that modern medical technology could unlock its secrets.

He spearheaded efforts to get medical, science and art institutions in St. Louis, the U.S., and Egypt to discover the mummy's past.

"I saw the possibility of a scientific paper," said Wiman, who spent 30 years as a medical and science reporter for St. Louis television stations.

A team of radiologists and geneticists from Washington University studied the mummy. Salima Ikram, an Egyptologist and mummy specialist at The American University in Cairo; anthropologist Dean Falk at Florida State University; and conservator Emilia Cortes of The Metropolitan Museum of Art in New York also agreed to help.

A small snippet of the mummy's wrapping tested for carbon dating suggested the child had lived between 30 B.C. and 130 A.D., in Egypt's Roman period around the time of Mark Antony and Cleopatra.

Three-dimensional images from CT scans of the child's bones, skull, teeth and body cavity suggested the child lived to be seven or eight months. The CT scans revealed a long wooden rod against the child's back that supported the mummy wrapping. All of the scans were done without having to remove the wrap.

Scans detected a hole in the child's skull. The brain, like jelly, would have drained through the hole and out through a nostril as part of the mummification process, Washington University dentist and anthropologist Charles Hildebolt said. The scans also identified small incisions on the left side of the body through which the child's internal organs were removed and placed in jars.

One of the most interesting finds was a series of amulets or charms in the boy's body cavity and in the wrapping, suggesting his family was well-off. "The wrapping was a protective cocoon for the body," Hildebolt said. "Prayers and amulets were a protective cocoon for the metaphysical soul."

Corpses prepared for mummification were soaked in a salt and baking soda solution for 40 days, then kept in oils for 30 days.

Washington University geneticist Anne Bowcock said she feared the DNA would have undergone chemical changes or been "contaminated" by those who handled the corpse. But that wasn't a problem.

The challenge was boring into the mummy, which had petrified, to get three samples of degraded muscle, tissue and bone. She succeeded by inserting a thick needle into the chest and shoulder. After that, she extracted DNA using routine methods. Tests showed the boy's mother was European. She plans more tests to determine his father's ancestry.

Bowcock said it was amazing to get anything at all from 2,000-year-old DNA.

Science Center staff were concerned that a mummy exhibit would disrespect the dead. But Egyptologist Ikram said the hope was instead that it would honor the child's life.

A "mummy prayer" accompanying the exhibit speaks of "all things good and pure on which a god lives, to the spirit of the revered Child, the justified one."