## National Museum of Health and Medicine
## Forensic Friday Resources

**"…this is…a museum about the triumphs of medicine, especially military medicine."**

*The Washington Post*, Oct. 24, 2008

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# MATERIAL EVIDENCE

*"Medically Ready Force…Ready Medical Force"*

This is material evidence that includes a box marked Material Evidence, a wallet containing identifications and cards, pins, and a dog tag, all used during the Forensics Workshop at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

# HEIGHT ESTIMATION

This is an osteometric board, replica ulna, and calculator that are used for the height estimation station during the Forensics Workshop at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

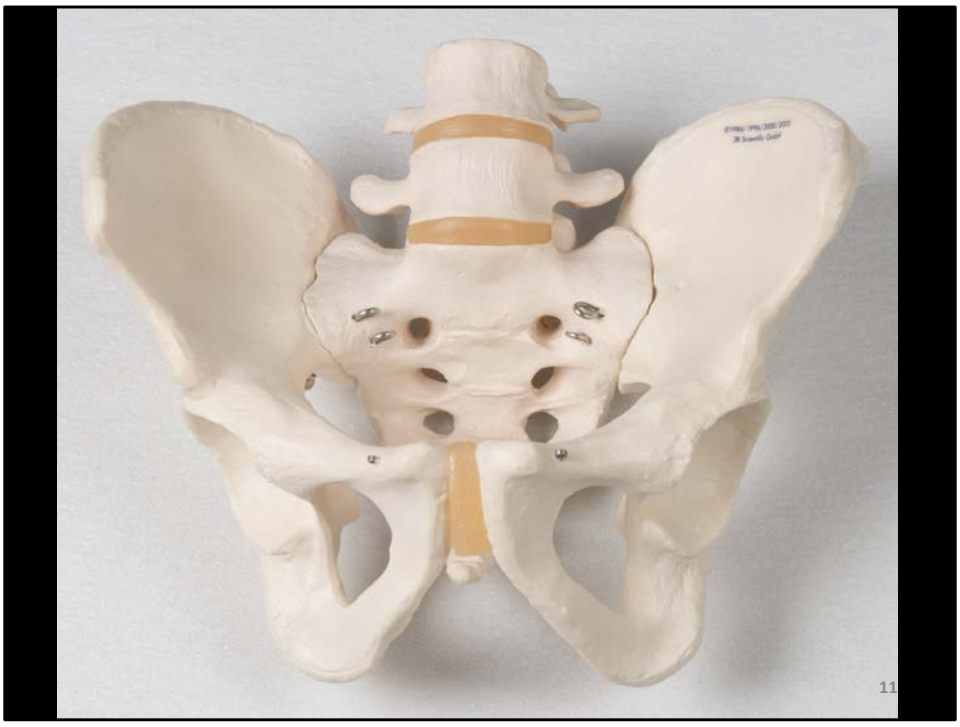
Femur, Adult Male. An individual's stature is estimated by using known correlations between long bone length and a person's height. (2008.3008.290)
(Disclaimer: this image has been cropped to emphasize the subject). (National Museum of Health and Medicine photo by Matthew Breitbart/Released). (Unclassified).

# SEX ESTIMATION

This is a cow bone used in the Forensics Workshop and Forensic Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

Pelvis, Adult Female. MM 4208
On display at the National Museum of Health and Medicine.
(Disclaimer: this image has been cropped to emphasize the subject). (National Museum of Health and Medicine photo by Matthew Breitbart/Released). (Unclassified).

Pelvis, Adult Male. The most useful bones in estimating sex are those of the pelvis due to the functional and structural differences related to childbirth. Male bones are generally more robust with more prominent landmarks. Female bones tend to be more gracile with less prominent features. 1990.0005.04.
On display at the National Museum of Health and Medicine.
(Disclaimer: this image has been cropped to emphasize the subject). (National Museum of Health and Medicine photo by Matthew Breitbart/Released). (Unclassified).




This is a replica of a male pelvis used in the Forensics Workshop and Forensic Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

This is a replica of a female pelvis used in the Forensics Workshop and Forensics Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

(Left) This is a cast of a female cranium. This cast is used in the Forensics Workshop and Forensic Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart) (Right) This is a replica male cranium. The skull cap is articulated to show the interior structures of the skull. This replica is used in the Forensics Workshop and Forensic Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

(Left) Skull, Adult Male. 2011.3010.04
(Right) Skull, Adult Female. 2011.3010.05
On display at the National Museum of Health and Medicine.
(Disclaimer: this image has been cropped to emphasize the subject). (National Museum of Health and Medicine photo by Matthew Breitbart/Released). (Unclassified).

# AGE ESTIMATION

This is a cast of a humerus showing the epiphysis of the proximal end. This cast is used in the Forensics Workshop and Forensic Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

(From left to right)
Humerus, 1.5-2 years. 1998.0015.07
Humerus, 2.5-3 years. 1998.0015.05
Humerus, 7-9 years. AFIP 0384956
Humerus, 16-20 years. AFIP 1395838
Humerus, Adult. 2000.0016.01
These specimens are on display at the National Museum of Health and Medicine. (Disclaimer: this image has been cropped to emphasize the subject). (National Museum of Health and Medicine photo by Matthew Breitbart/Released). (Unclassified).

# TRAUMA

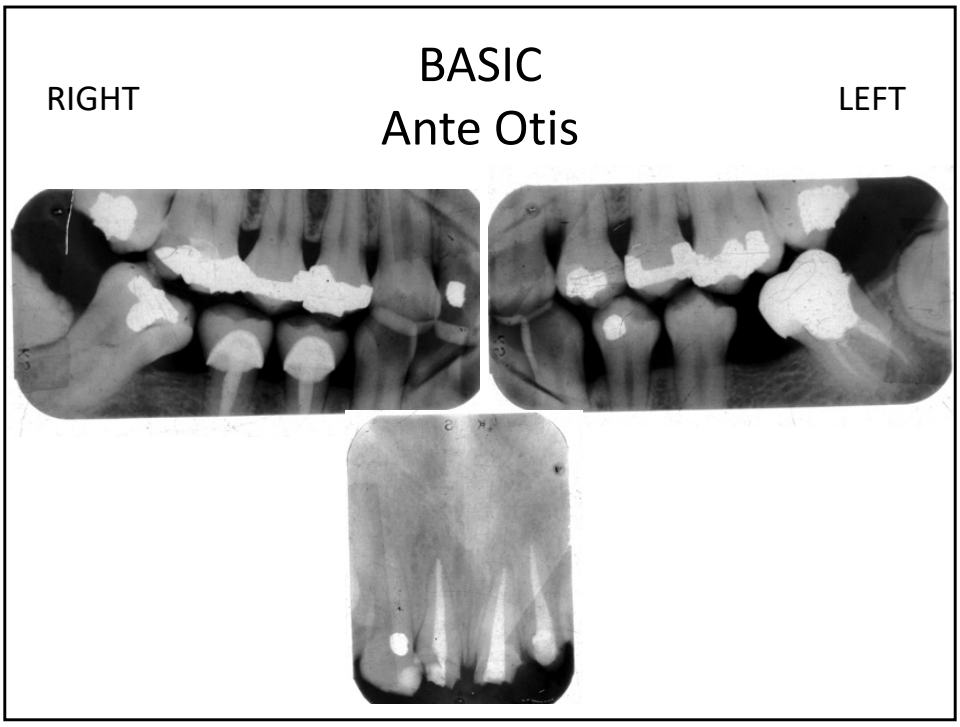
This is a cast of a radius showing muscle attachments and antemortem trauma. This cast is used in the Forensics Workshop and Forensic Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

This is the cast of an amputated Civil War bone showing osteomyelitis on the distal end. This bone is used in the Forensic Workshop and Forensic Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

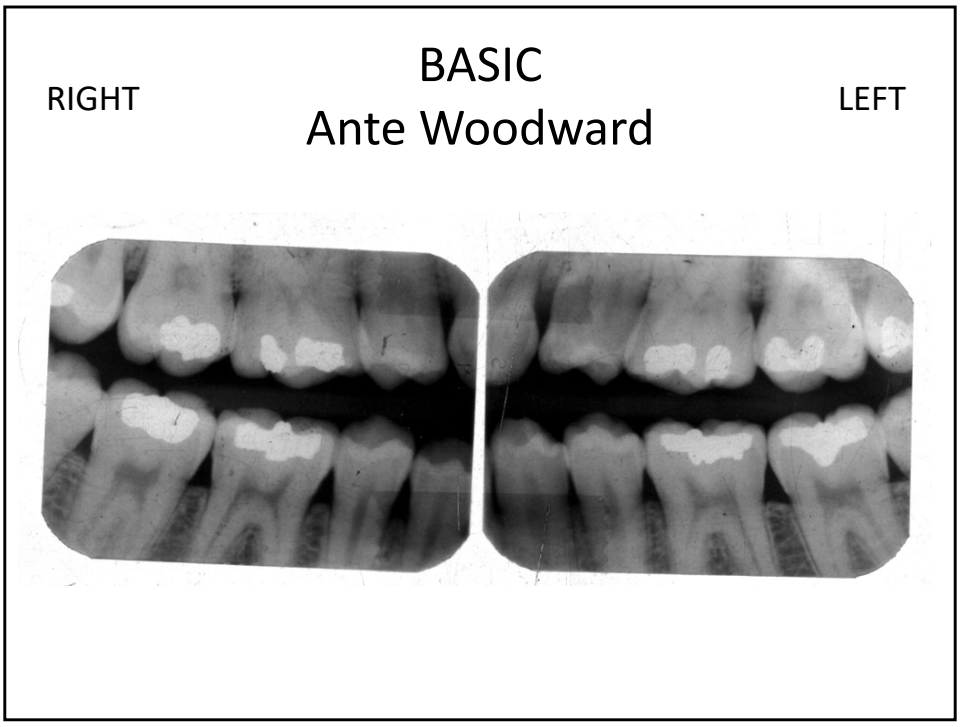
This is a cast of an amputated humerus used in the Forensics Workshop and Forensic Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

This is a cast of a humerus bone with a healed fracture at the proximal end. This cast is used in the Forensics Workshop and Forensic Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

# DENTAL IDENTIFICATION




(Unclassified).



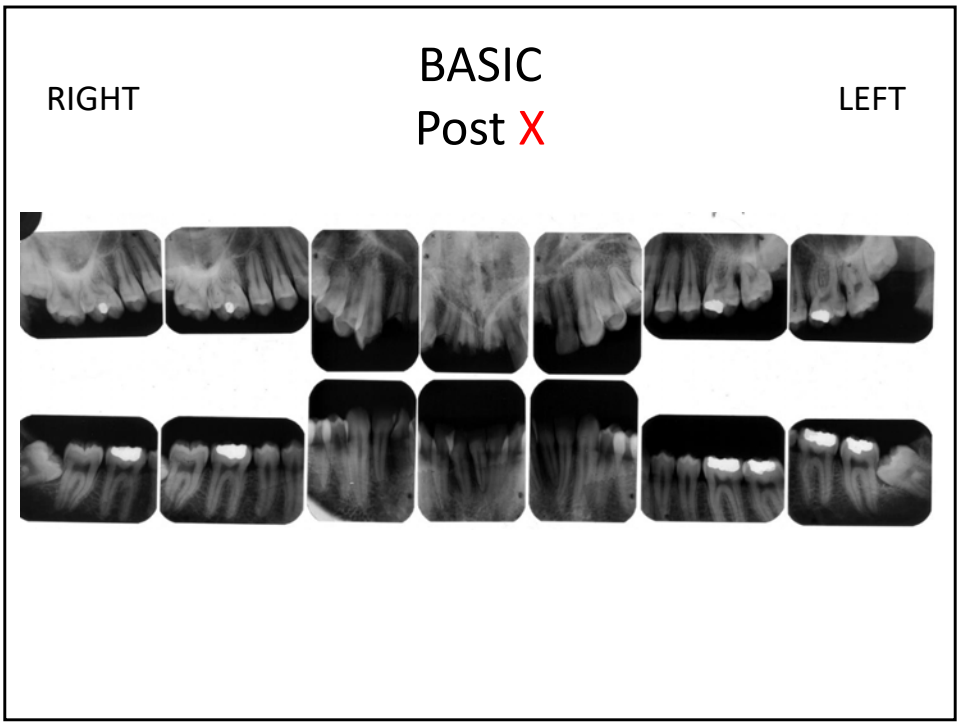

(Unclassified).

RIGHT

# BASIC
# Ante Russell

LEFT

(Unclassified).




(Unclassified).

This is a cast of a mandible with one filling. This cast is used in the Forensics Workshop and Forensic Discovery Cart at the National Museum of Health and Medicine in Silver Spring, Maryland. (Disclosure: This image has been cropped to emphasize the subject.) (National Museum of Health and Medicine Photo by Matthew Breitbart). (Unclassified).

Mandible and Maxilla Cutaway, Child, 5-7 years. AFIP 0107620.
On display at the National Museum of Health and Medicine.
(Disclaimer: this image has been cropped to emphasize the subject). (National Museum of Health and Medicine photo by Matthew Breitbart/Released). (Unclassified).

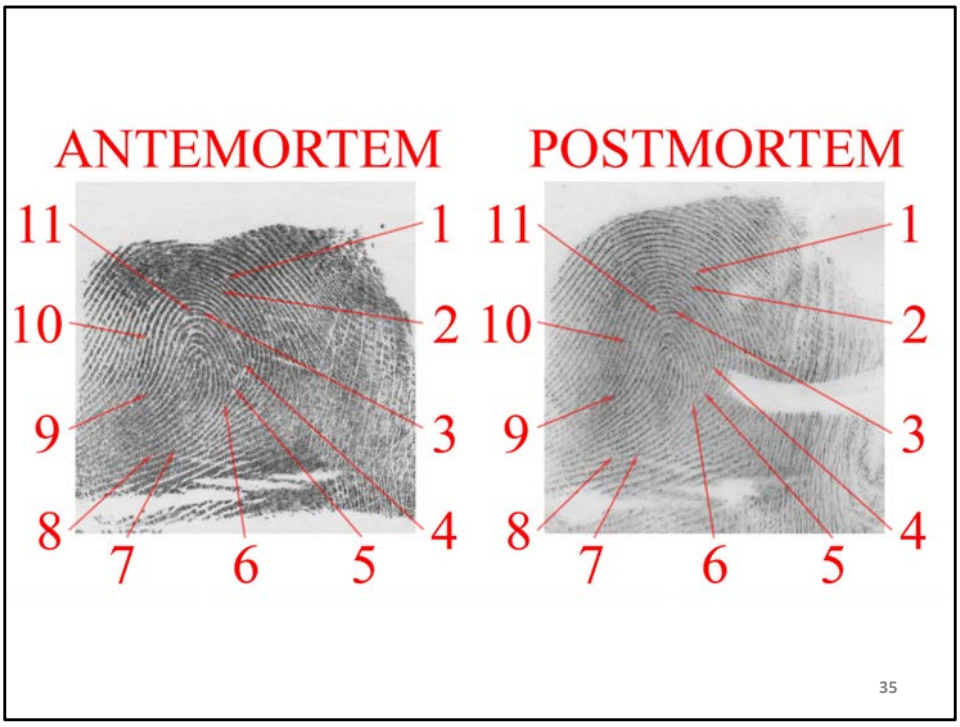
Portable Dental X-ray Prototype, ca. late 1990s. Challenges of transporting heavy equipment around the world led U.S. military dentists to evaluate portable devices. In the late 1990s, a portable radiation capture device was used as a tool that allowed dentists to perform identification work in the field. 2011.0028.2.
On display at the National Museum of Health and Medicine.
(Disclaimer: This image has been cropped to emphasize the subject). (National Museum of Health and Medicine photo by Matthew Breitbart/Released). (Unclassified).

# FINGERPRINTS

Arch. (Unclassified).

Loop. (Unclassified).

Whorl. (Unclassified).




The antemortem and postmortem comparison points. (Unclassified).

# DNA IDENTIFICATION

Blender Cup. Blender cups are used to turn solid bone into a powder. Powdered bone undergoes a series of chemical washes to free the DNA from the bone. M-722.10259.
DNA Collection Kit with Antemortem Blood Card. M-762.10344.
Antemortem DNA Collector, Cheek Swab. M-726.10457.
10,100, and 1,000 uL Pipettes Used to Move Small Volumes for DNA Analysis. M-722.10255.
On display at the National Museum of Health and Medicine.
(Disclosure: This image has been cropped to emphasize the subject). (National Museum of Health and Medicine photo by Matthew Breitbart/Released). (Unclassified).

Gene Amp 9600 Thermocycler. A thermocycler is used to amplify DNA using an enzymatic reaction called the polymerase chain reaction (PCR). M-722.10234. On display at the National Museum of Health and Medicine.
(Disclaimer: this image has been cropped to emphasize the subject). (National Museum of Health and Medicine photo by Matthew Breitbart/Released). (Unclassified).

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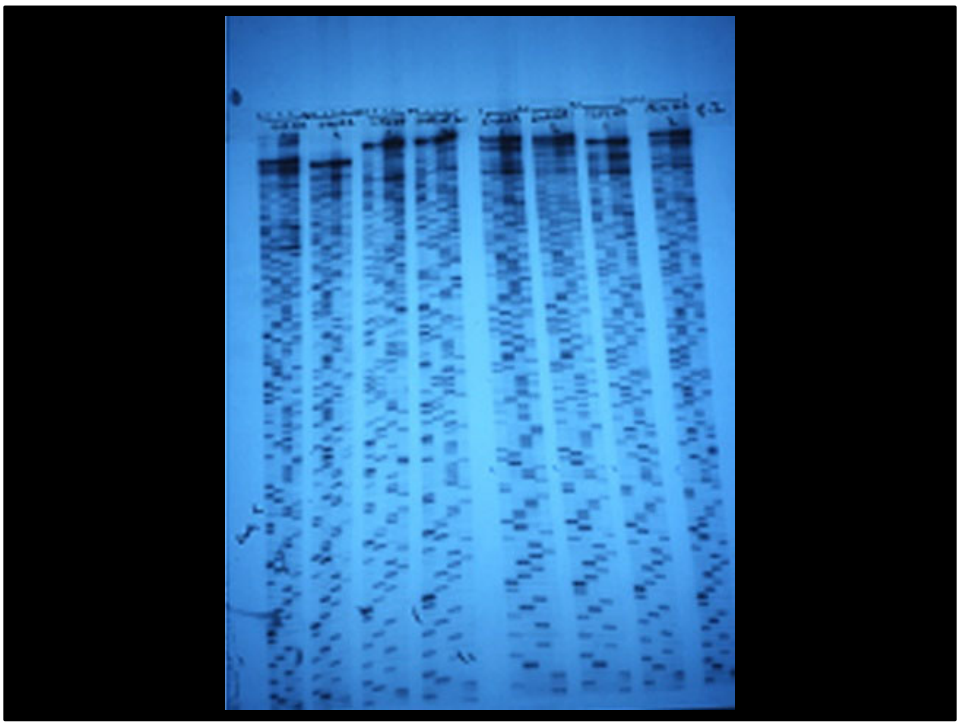
**SAKCUMU(5** Are these machines still commonly used? Do we need dates?
Schierkolk, Andrea K CIV USARMY MEDCOM USAMRMC (US), 4/30/2020



Exposed X-ray showing genetic sequence of the 1918 influenza virus. 1996. For more information visit: https://www.medicalmuseum.mil/index.cfm?p=exhibits.virtual.1918killerflu.index (M-722.10196.). (Unclassified).

# Contact Us

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For more information on these images or collection resources related to Forensics:
RESOLVED: Advances in Forensic Identification of U.S. War Dead
Naming the Vietnam Unknown
Anatomical Collections
Otis Historical Archives

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