

Season 1, Episode 7 - May 2025

Radio - Television -
Broadcast News -
Audio - Video Capture

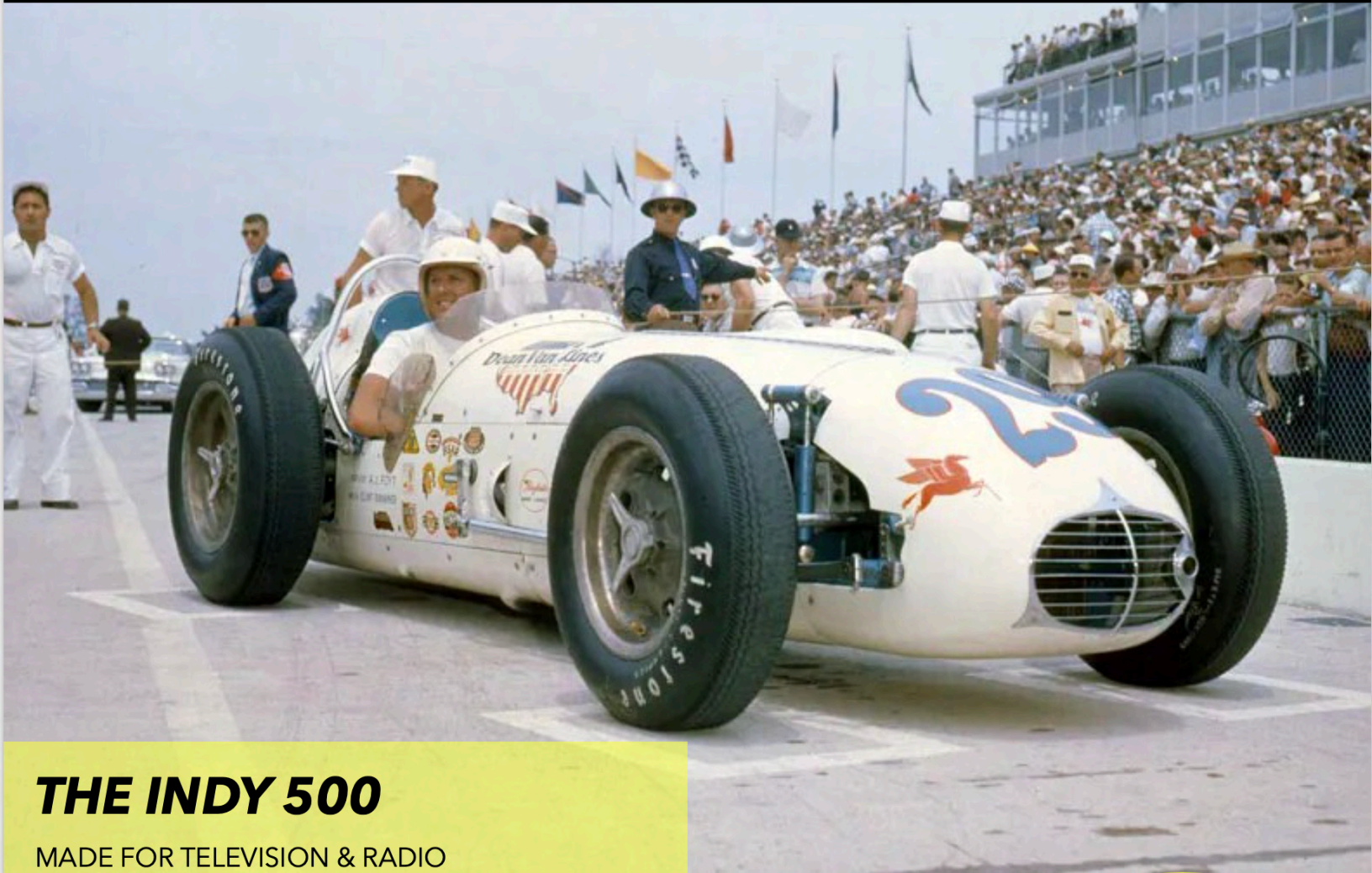
The Technology that
Brought the World to
Your Home



TEXAS
BROADCAST
MUSEUM

MONTHLY

MINI-MAGAZINE



THE INDY 500

MADE FOR TELEVISION & RADIO

GRANDFATHER CLOCK RADIOS

A FAD OF THE 1930S TO INTEGRATE RADIOS
INTO HOME DECOR



IN THIS EDITION



THE INDY 500 STRETCHES THE REACH OF TV AND RADIO / **PAGE 3**

Indy 500 is one of the first sporting broadcasts to be heard on radio or seen on Television.



GRANDFATHER CLOCK...RADIOS!! / **PAGE 8**

Combining Household decor with entertainment.



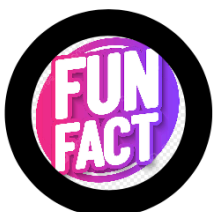
TV OF THE MONTH - IS IT A ROBOT?/ **Page 10**

The Zenith "Bugeye from the late 1950s.



THE INDIAN TEST PATTERN/ **Page 12**

The origin of the iconic early test pattern for television - Why it was developed and how it was used.



I DID NOT KNOW THAT! / **PAGE 14**

Interesting facts about Vintage TVs, Radios, Television Cameras and Audio devices. December



MUSEUM OF THE MONTH / **PAGE 16**

The Paley Center for Media offers archives of all things radio and TV content, as well as vintage technology exhibits from the eras of Americana.

T HE GREATEST SPECTACLE IN RACING



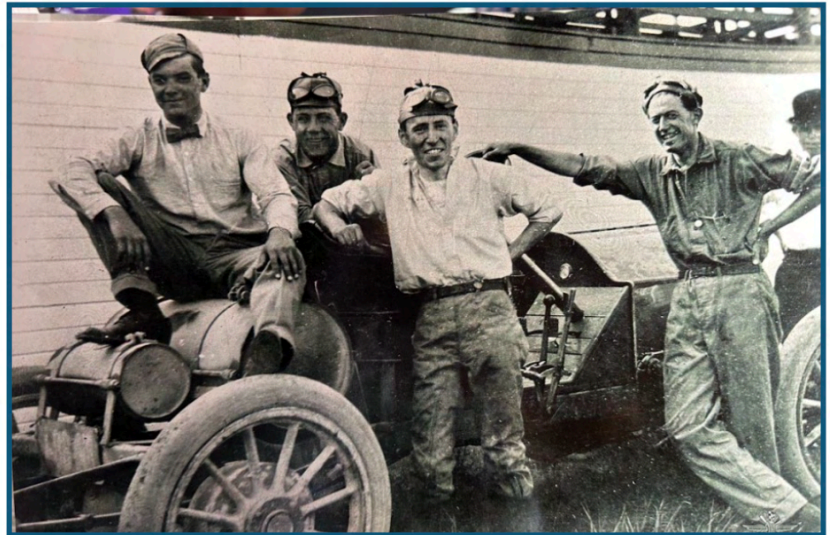
RADIO HEARS RACING

In the early era of radio, stations (and eventually, Networks) were actively in search of entertaining content to fill large gaps of programming time, without simply being all-music all the time. In fact, in the 1920s, most radio stations did not broadcast for the entire day due to both lack of content and only about 1% of US households had a radio to receiver programming.

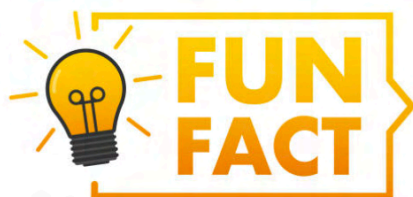
Many operated for a few hours in the morning or evening, and some only broadcast for less than 8 hours a day. Some even had limited programming, or even shut down during certain times due to shared frequencies.

The history and evolution of sports event broadcasts began on April 11, 1921, when KDKA in Pittsburgh aired the first live sporting event on the radio. They broadcast a boxing match between Johnny Ray and Johnny Dundee. This historic moment paved the way for more sports coverage.

That next step beyond boxing was auto racing, and it began with "The Greatest Spectacle in Racing", the Indianapolis 500 race. There were few events that could attract or seat 100,000 or more (there were some early, temporary boxing venues that could hold 100,000+, but these "stadiums" were meant to last for a few weeks and be torn down.



1922 Indianapolis 500 - Mechanic rode in the car during the race with the driver to make speedy repairs.



The largest outdoor boxing stadium built in the 1920s was Boyle's Thirty Acres, located in Jersey City, New Jersey. Built in just nine weeks, it held an estimated 80,000-90,000 fans. The stadium was built to host the Dempsey vs. Carpentier fight in 1921

In 1922, with an estimated race-day stadium audience of 135,000 people, radio coverage began for the Indy 500 with small Indianapolis stations, WOH and WLK, broadcasting race descriptions. At a time when only a handful of people in the Indianapolis area even owned a receiver, individuals who made early efforts to broadcast the race generally were little more than what would later be described as ham radio operators.

The first significant broadcast took place in 1924 when a Chicago station using the call letters WDAP was on hand. This broadcast occurred just a matter of days before WDAP transformed into the *Chicago Tribune's* eventual broadcasting giant, WGN.

The coverage was such a hit with the loud roars of the engines on local stations, that, in 1928, NBC decided to cover the 500 and sent its lead announcer, the already-legendary Graham McNamee. He returned for another decade and, on into the 1930. Then, for the first time in 1929, WKBF and WFBM carried the 5 ½ hour full race broadcast.

At the turn of decade in 1930, an estimated 170,000 fans jammed the stands, while NBC, CBS and The Mutual Radio Network all got into the action to call

the race. For 1951, Mutual substantially raised its advertising rates, and its primary sponsor, Perfect Circle Piston Rings, pulled its support. Mutual eventually decided to stop covering the event, and it appeared for a time that the 1951 race would not be carried on radio.



1951 Indy 500 winner Lee Wallard

In early May of 1951, Speedway president Wilbur Shaw consummated a last-minute deal for WIBC to cover the race, with Sid Collins as anchor. WIBC's format followed that of Mutual's, with live coverage at the start, the finish, and periodic updates throughout the race.

After the success of WIBC's radio effort in 1951, the Speedway management became interested in taking the broadcasting duties in-house permanently. In 1952, the Speedway officially launched the Indianapolis Motor Speedway Radio Network, utilizing on-air talent and technical support from WIBC

The IMS format again followed the Mutual-style format, with live coverage at the start, the finish, and



Radio presenter Erwin Craven announcing race, 1947 Credit: Indiana University Indianapolis [View Source](#)

1947 race radio announcer Erwin Craven.

periodic updates during the race The 1953 race was notable in that it expanded to feature the first live "flag-to-flag" coverage, and the affiliate count had already grown to 130 stations.

During this time, the broadcast was typically simulcast on all the major stations in Indianapolis, and nationwide. In some years, affiliates would sign up as late as the morning of the race, anxious to carry the broadcast. By 1955, the broadcast could be heard in all 48 states (there were only 48 states at the time). In 1961, it reached new states Alaska and Hawaii as well.

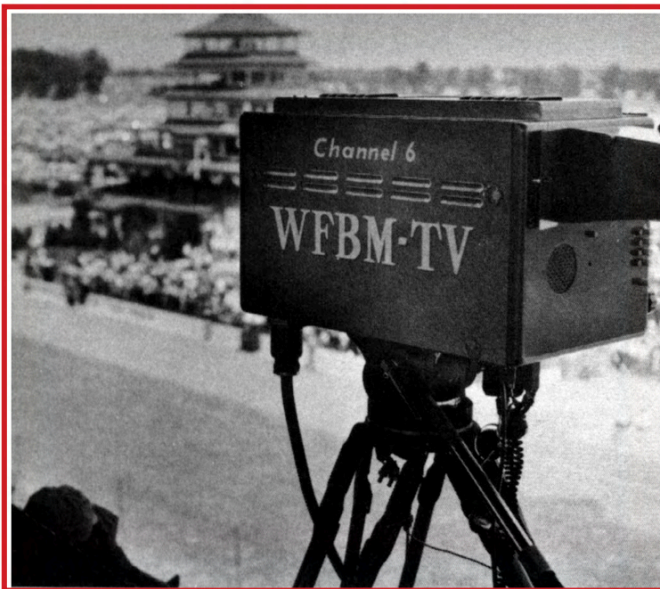
Worldwide shortwave transmission through Armed Forces Radio started in 1953 and claimed to reach every country where English was spoken. In 1964, an affiliate in Rhode Island picked up the broadcast for the first time, meaning that a terrestrial affiliate originating from all 50 states were now part of the network (previously Rhode Island listeners could only hear the broadcast from a neighboring state). WJAR in Providence signed on to the 1964 race with 557 other affiliates for the historic milestone.

A star (The Indy 500) was born and the big race has been continuously broadcast worldwide on the IMS network for almost 75 years.

TELEVISION BROADCAST

In the post World War II era, the Golden Age of Television ushered-in a place in the TV viewing schedule for the Indy 500. In 1949, WFBM-TV began to broadcast in Indianapolis. Their first broadcast was a documentary about the Indianapolis 500 titled *Crucible of Speed*. The documentary was followed by the inaugural live television broadcast of the now famous race.

There were three cameras placed along the main straightaway of the Indianapolis Motor Speedway, but 10



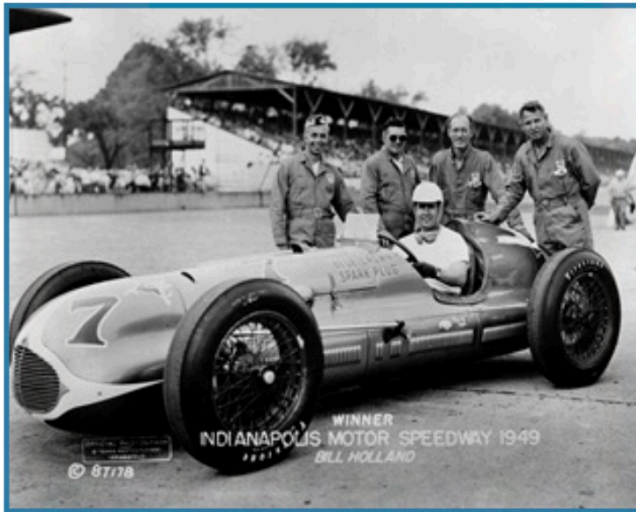
WFBM Camera at the 1949 Indy 500



WFBM Production Truck at the Indy 500. Likely in the early to mid-1960s

custom cameras were built by the WFBM engineers for the occasion, the most ever to be used up until that point for any live event on television. To recoup some of their investment, WFBM sold about half the cameras to area stations after race week. Former radio announcer Earl Townsend, Jr. served as the lead announcer, Dick Pittenger and Paul Roberts served as color commentators and Robert Robbins was the pit reporter.

In 1949 and 1950, the broadcast reached about 3,000 households. Speedway officials decided to stop the live local broadcasts because they feared that they would reduce attendance. As a result of this decision, live television of the race did not happen from 1951 - 1964. Then, in 1965, ABC broadcast the taped portions of the race three days after the race as part of their popular Wide World of Sports program.



1949 Indy 500 Winner - Bill Holland

To see the event live, from 1964 to 1970, theaters and venues across the

country opened their doors, at a price, for fans to come in and watch the greatest spectacle in racing live via closed circuit TV.

As part of the closed-circuit contract, IMS placed a three-day embargo on showing the race on network television. In 1971 with the 72-hour embargo lifted, the Indianapolis 500 was shown tape-delayed on race day. The race was edited to a 3-hour broadcast and shown in prime time on ABC, but it was not broadcast in Indianapolis until July 4.

Live coverage of the race on network TV began in 1986 with "flag-to-flag" coverage of the 70th running, and the fears all those years of Indianapolis residents not attending the race live, were unfounded, as the track breaks records every year for attendance. In fact, the race was sold out in 2024 and is sold out again in 2025, with an estimated 375,000 fans filling the stands.

ABC, then NBC broadcast the event, and in 2025, the race airs on Fox.

MOSQUE - Richmond, Va.

LIVE ON THE GIANT CLOSED CIRCUIT TV SCREEN
THE ENTIRE 48th ANNUAL INDIANAPOLIS 500 MILE RACE

Race Time 11 a.m.

WILL NOT BE SHOWN ON HOME TV

3½

Thrill Packed Hours

More camera coverage than any sports event in TV history...

MEMORIAL DAY
Sat., May 30

ALL SEATS RESERVED

Prices: \$5.00 Balc. and Mex. \$6.00 Orch. and Loge. Tickets on sale: Rockingham Clothes; Mallory's Speed Shop; Firestone Stores—Lombardy and Broad; 815 Hull St., Zeke's 12th and Main Sts., Telephone information, dial 643-2788
PICK UP TICKETS AT ABOVE LOCATIONS OR USE ORDER FORM BELOW:

JOHN-MARSHALL TELECAST
16 SOUTH 12TH ST.
RICHMOND, VA. ZIP CODE 23219
ENCLOSED FIND CHECK \$ _____ or M.O. \$ _____
FOR BEST POSSIBLE SEATS AT \$ _____ EACH.

NAME _____
ST. ADDRESS _____
CITY _____ STATE _____

**Advertisement to see the 1964
Indy 500 Live via Closed Circuit
Television.**

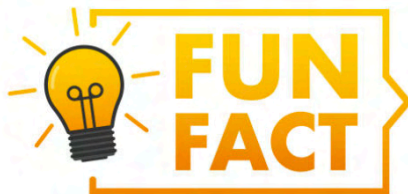


**INDYCAR
RADIO
RACE
BROADCAST**

INDYCAR RADIO Spotify Amazon music



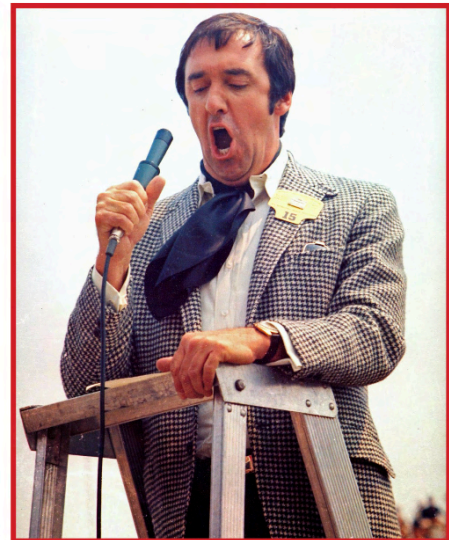
*Hundreds of Media Outlets
around globe now broadcast
the iconic Indianapolis 500*



Gomer Pyle becomes the iconic and musical voice of the Indy 500! Jim Nabors famously sang "Back Home Again in Indiana" before the Indianapolis 500

for 36 years, from 1972 to 2014. He was a beloved figure at the Indianapolis Motor Speedway, known for his genuine enthusiasm and friendly demeanor.

In 1972, then-owner Tony Hulman asked Nabors to sing the song before the race, and it quickly became a tradition. Nabors would often sing the song from the steps of the Indianapolis Motor Speedway. He was a true Hoosier at heart, even though he wasn't born in Indiana. His performances were always highly anticipated, and he was known for his humility and willingness to connect with fans. Nabors' last performance was in 2014, and he was missed by fans and the Indianapolis Motor Speedway alike.





CLOCK AND RADIOS MERGED TO SAVE FLOORSPACE & BE PART OF HOME DECOR

In the 1930s, radio was peaking, but radios were large and took up a lot of space in the family living room. To allow the size of the radio, and to encourage more buyers, in 1931, grandfather clock radios represent a unique intersection of clock-making and early radio technology, embodying the innovations of the 20th century. It offered families a chance to have a beautiful clock and radio entertainment in a smaller footprint than most radios at the time.

Grandfather clocks are often noted for their craftsmanship and intricate cabinetry, with this type potentially showcasing the art deco or art nouveau influences popular in the early 20th Century.

Often placed in living rooms or homes where vintage decor is appreciated, a grandfather clock radio can serve as both a functional piece for timekeeping (if in working order) and a captivating conversation starter. The clock/radio was positioned in offices or studies where a touch of classic elegance is desired, blending practical use with charm.



A Variety of 1930 - 1942 Grandfather Clock Radios

Design elements for these clocks included a mixed woods and a careful balance of form and function, reflecting the craftsmanship standards of the period

The Texas Broadcast Museum holds two examples of clocks from the dawn of the Grandfather Clock radio concept. The first is an Atwater Kent radio in grandfather clock cabinet. The cabinet contains an L.S. Brach clock at the top, a vintage AK radio set in the middle, and a substantial storage space behind a door at the base, and is in great shape for being almost 85 years old. The radio set is labeled as a Model 82 Super-Heterodyne.

1931 Atwater Kent Grandfather Clock Radio at the Texas Broadcast Museum





**1931 Sears Silvertone
Grandfather Clock Radio at the
Texas Broadcast Museum**

or for easy payment: \$ 9 "down" cash and \$ 8 per month until paid \$ 87.50. That price may seem like a bargain, but that was equivalent to \$1,862 in 2025, and a bit more than most radios or clocks cost today.

Recently, at auction, a 1931 Silvertone Grandfather clock/radio sold for \$1,500 before auction fees. So, if you know someone who has one, don't let them put it out by the curb on bulk pickup day!

**The Back an internal electronics
of the 1931 Sears Silvertone
Grandfather Clock Radio at the
Texas Broadcast Museum**

The second set is also from 1931 and is a Sears Silvertone Grandfather Clock Masterpiece with "Hammond Electric Movement" clock that has tone control and a Push-pull output. As described in the Sears catalogue from 1932, *"The cabinet is piano finished in handsome walnut veneer, and its design is authentic in every respect."*

Manufactured by Colonial Radio Company and sold under the Silvertone label, these pieces reflect the design and manufacturing trends of the Great Depression era, when companies sought to combine functionality with aesthetic appeal

The model could be ordered for 25 cycle mains for the same price (with a bigger transformer and some changes in the power unit). It was also available as 57FM1154 or 1155 with a Screen-Grid chassis. It went for the princely sum of \$ 79.50



ROBOT-LOOKING PORTABLE TVS ARE ALL THE RAGE IN THE LATE 1950'S



Sitting proudly near the front of the Texas Broadcast Museum is a quirky looking set known as the Zenith Z1817L, and more commonly known by its nickname, "the Bugeye" set. The reason it got that monicker is because it looks like a little space alien with the controls for volume and channels selection looking like eyes next to the CRT screen "face".

Made in 1955, this large metal-cased TV was designed to sit on a table or a stand. The cabinet is dark maroon with a contrasting silver bezel and gold accents in the knobs. The Zenith name appears in raised letters at the top of the bezel and there is a small gold metal Zenith logo on the control panel at the top

People either love or hate the design of this classic 1950s black and white television. With its rounder, futuristic lines, and cat's-eye shaped knobs on either side of the screen, it brings images of a robot or space-alien to mind. It is considered a "portable" by 1950s standards, but still is weighty to carry around in the modern world. Still, it had a carrying handle for trips for your hernia checkup!

The set had a UHF Tuner, which was a relatively advanced feature for the time. The cabinet was often made of Bakelite, a hard, early plastic known for its durability and distinctive look. It has a large (for the time) seventeen-inch screen and could be purchased in 1955 for about \$185, that is a 2025 price equal to a princely sum of \$2,215!.



Zenith Model Z1817L at the Texas Broadcast Museum

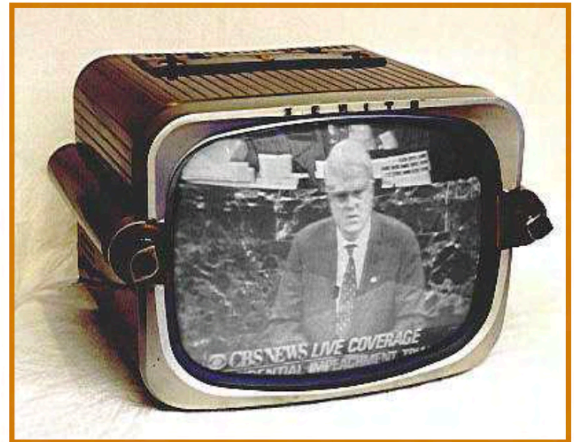


Zenith Model Z1511B (left) and its sister Model, the Zenith Z1817L at the Texas Broadcast Museum

The set is particularly appealing to collectors, as the "Bugeye" evokes a sense of nostalgia for a bygone era of television. In addition, the technical challenges of restoring these sets can be appealing to hobbyists and electronics enthusiasts.

For those who seek the restoration challenge, a Zenith Bugeye is fairly common to find even today, and one in good cosmetic condition with a good CRT will run you about \$100 unrestored. Fully restored, these sets can command \$250 - \$400 from the right collector.

SOME OF THE ZENITH BUGEYES



THE GENESIS & HISTORY OF THE ICONIC INDIAN HEAD TEST PATTERN



The Indian Head Test Pattern shown on a Vintage TV at the Texas Broadcast Museum

The "Indian Head" test pattern, a prominent visual aid in early black and white television, was used for calibrating and testing the quality of broadcast displays. Created by RCA, it featured a detailed portrait of a Native American chief, surrounded by graphic elements designed to measure various technical aspects like focus, contrast, and linearity.

The pattern was introduced in 1939 and over the following two decades became a fixture of television broadcast across North America in 525-line resolution and (often in modified form) abroad in 525- and 625-line resolution.

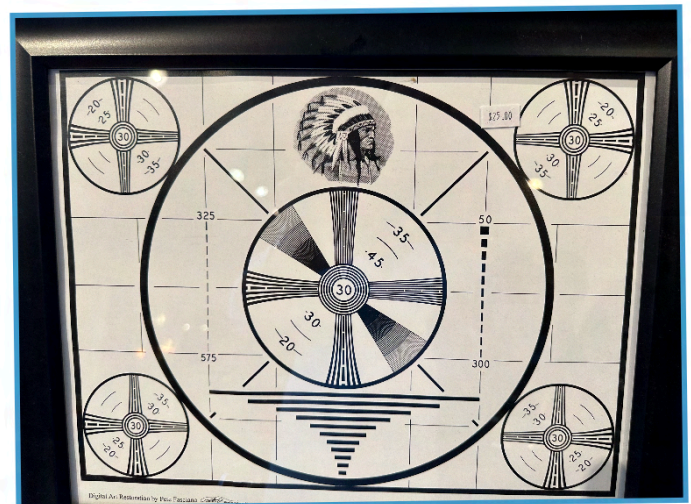
The pattern began with the Indian-head portrait created in August 1938 by an artist named Brooks using pencil, charcoal, ink and zinc oxide. For about a year, the portrait

(which contains several identifiable shades of gray from Zone VIII texture in the white feathers to Zone II texture in the black hair) was the entire test pattern, but in 1939 the portrait was incorporated into the current pattern of calibrated lines and shapes.

This pattern was a standard tool for television stations to ensure their equipment was properly calibrated before broadcasting. The Native American chief's image, especially the intricate details in his headdress and facial features, helped check for sharpness, focus, and accurate grayscale reproduction.

Further, the pattern included lines, circles, and other geometric shapes designed to test for linearity, perspective, and other broadcast-related parameters. The portrait itself, with its range of grays, was used to verify color reproduction in black and white displays, making it a valuable tool for adjusting brightness and contrast.

In some cases, the Indian Head pattern was also used as a sign-off image, a common practice when stations were not broadcasting for extended periods. From the late 1950s the test pattern gradually began to be seen less frequently, after fewer sign-offs, on fewer stations, and for shorter periods in the morning, since



Original Artwork at the Texas Broadcast Museum



Original Artwork at the Texas Broadcast Museum

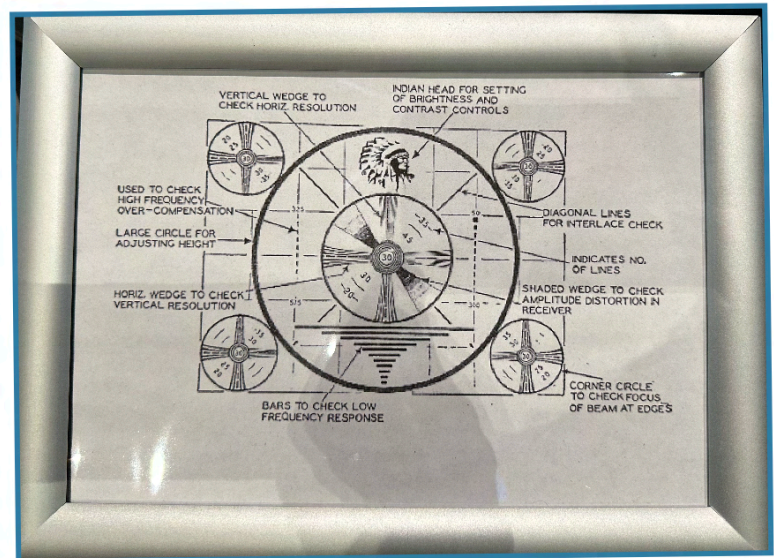
1990s, most television stations in the United States have broadcast continuously without regular sign-offs thus, the broadcast of test patterns has become mostly obsolete (though they are still used in post-production and broadcast facilities to check color and signal paths).

Nevertheless, the Indian-head test pattern persists as a symbol of early television. Many U.S. television stations chose the image of the Indian-head card to be their final image broadcast when their analog signals signed off for the final time between February 17 and June 12, 2009, as part of the digital television transition in the United States.

The original artwork for the test pattern is on loan and display at the Texas Broadcast Museum. It belongs to Will Heirerman, a collector from Houston. He acquired it from Chuck Pharis, who owned it for a number of years. It was rescued from a dumpster when the RCA tube plant was torn down.

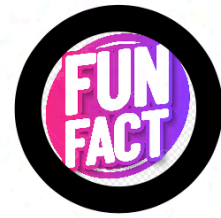
new and improved TV broadcast equipment required less adjusting. In later years the test pattern was transmitted for as little as a minute after sign-off while the transmitter engineer logged required Federal Communications Commission-US/Board of Broadcast Governors transmitter readings before cutting power.

The Indian-head test pattern became obsolete in the 1960s with the debut of color television; from that point onward, an alternate test card of SMPTE color bars (and its immediate predecessors), or colorized versions of the NBC/CBS-derived "bullseye" patterns became the test card of choice. Since the



Original Artwork at the Texas Broadcast Museum

DID NOT KNOW THAT



Technical Challenges -

The equipment and technology available in the 1970s were more limited compared to modern

broadcasting, which meant that broadcasts often had fewer angles and lower quality.



New Technologies -

The race venue was one of the first to use cameras with telephoto lenses to zoom in on the action and provide a closer view of the race.

New Technologies - The race venue was one of the first to use cameras with telephoto lenses to zoom in on the action and provide a closer view of the race



The first live sports broadcast on the radio occurred on April 11,

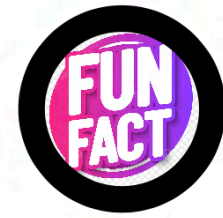
1921, when KDKA in Pittsburgh, Pennsylvania, broadcast a boxing match between Johnny Ray and Johnny Dundee. Florent Gibson, a sports editor for the Pittsburgh Daily Post, provided the commentary. This event is considered the genesis of sports radio broadcasting.

KDKA also broadcast the first Major League Baseball game (Pittsburgh Pirates vs.



Philadelphia Phillies) on August 5, 1921, with announcer Harold Arlin. The first college football game on the radio was broadcast by KDKA on October 8, 1921, featuring West Virginia University vs. Pittsburgh University .

DID NOT KNOW THAT



BLACK AND WHITE BROADCASTS STILL HAVE LEGS IN THE UK

Over half of the UK's TVs now connect to the internet so it's interesting that more than 7,000 households still choose to watch their favorite shows

on a black and white telly. Regular color broadcasts began on BBC Two in July 1967 with the Wimbledon tennis tournament". The number of black and white licenses issued each year has since been in steady decline since. In 2000, there were 212,000 black and white TV licenses but by 2023 that number had shrunk below 7,000.



FIRST TELEVISION CAMERA

The first widely recognized television camera was the Image

Dissector invented by Philo Farnsworth, which transmitted its first image in 1927, though the exact cost of this early prototype is not readily available as it was primarily a research project:

- o Camera name: Image Dissector
- o Key feature: It converted light into electronic signals that could be transmitted as images.



MUSEUM OF THE MONTH



The Paley Center for Media is a 501(c)(3) nonprofit organization that operates the iconic Paley Museum in New York, which has been named The City's Best "Best Museum" and "Best Children's Party Place" for two years running. Through its respected programming, the Paley Center leads the discussion

about the cultural, creative, and social significance of media, drawing upon its curatorial expertise, an international collection, and close relationships with the media community.



The general public can enjoy best-in-class Paley events in both New York and Los Angeles. The public can also access The Paley Archive at The Paley Museum in New York and at the Beverly Hills Public Library.

Previously

known as The Museum of Television & Radio, the Paley Center was founded in 1975 by William S. Paley, a pioneering innovator in the industry.

The Paley Center for Media has an international collection of over 160,000 programs from over 70 countries, covering more than 100 years of television and radio history, including news, public affairs programs and documentaries, performing arts programs, children's programming, sports, comedy and variety shows, and commercial advertising.



"Lost" television programs recovered by The Paley Center for Media and preserved in the collection include the first Super Bowl, a Rat Pack benefit variety show, and James Dean performances.



**Visit the Paley Center for Media at:
25 W 52nd St, New York, NY 10019**

LIVE SWAP MEET AT THE TEXAS BROADCAST MUSEUM



HAM RADIO TAILGATE SALE AT THE TEXAS BROADCAST MUSEUM JUNE 7TH (8AM - 3PM)

In cooperation with the Longview Amateur Radio Club (LETARC), the Texas Broadcast Museum will be hosting a Ham Radio Tailgate Sale. Attendees are welcome and encouraged to bring their radio (or other electronic) gear and try to find new homes for it.

The Museum will also have a lot of surplus equipment available at very reasonable prices. It will be held in the Texas Broadcast Museum parking lot. Those selling items can setup at 8 AM on Saturday, June 7, with the sale starting at 8:30. The LETARC people want to start leaving at 11:00, but the Museum stuff will be available until 3 or 4 PM.

LETARC is a non-profit group dedicated to encouraging the hobby of Amateur Radio in the Longview-East Texas Area. We have folks within our membership involved in just about every aspect of Ham Radio. So, there is something for every interest.

LETARC Mission Statement

We provide support and education for amateur radio operators in the Gregg County area. In addition we provide radio communications nets to inform the community during severe weather and disaster events. We help other local chapters of community organizations with their communications needs during disasters through our Amateur Radio Emergency Service (ARES) volunteers. These other organizations include local first responder organizations, Red Cross, CERT, and Salvation Army.

H

ELP US PRESERVE
BROADCAST HISTORY



If you have that pile of old stuff that's just been sitting in the barn or basement, it might be something we've been looking to add to our collection for others to enjoy. Old TV cameras, tape systems, audio equipment or early radios and TV sets? Old hardware manuals? Give us a call **(903) 985-8115**, or shoot us an email at **info@txmbc.org**

For us, older is better - radio, camera equipment or something else. Best of all, we have a new 8,500 square foot storage and staging facility to house new donations.

Of course, there is always money. The Museum owns its building and real estate, but insurance, utilities and maintenance are huge expenses. Besides the modest admission fee and seasonal facility rental for special events, the Museum relies on donations from our supporters. Can you help?

To donate financially, please use the QR code below.



