

THE ULTIMATE MAKEOVER – AN AVIATION STORY

The timeframe in this part of our aviation story finds us in Bloomfield, Connecticut nearly 55 years ago. It was then that Kaman Aircraft Corporation finished manufacturing a UH-2D *Seasprite* for delivery to the U.S. Navy. Over the next 29 years, this particular airframe would log 10,278 flight hours while serving in both the Atlantic and Pacific Fleets, assigned to squadrons onboard among other ships, USS *Saratoga* (CVA-60), USS *America* (CVA-66), and USS *Lexington* (AVT-16). Its flying days ended in 1992 with HSL-31, the West Coast LAMPS FRS. Undergoing modifications, airframe and model changes over the years, the original UH-2D finished up service as a SH-2F, Bureau Number (BuNo) 151312.

Shortly after ending its flying career at HSL-31, BuNo 151312 finds its way into the care and custody of the National Naval Aviation Museum (NNAM) in Pensacola, Florida. It then settles into long-term parking on the ramp adjacent to the NNAM onboard NAS Pensacola, taking its place with dozens of other distinguished aircraft on outdoor display.

An earlier time in this aviation story is required to set the stage for the future fate of BuNo 151312. The year is 1945 and a young, innovative engineer named Charlie H. Kaman starts Kaman Aircraft Corporation and sets his sights on a new helicopter design based on his invention of the servo-flap controlled rotor. With ~ \$5000 worth of laboratory rigs and a bold idea, Kaman Aircraft Corporation (KAC) is launched in Bloomfield. In 1947, KAC's first helicopter (the K-125) takes flight; the K-125 is an intermeshed contra-rotating twin rotor helicopter. Other innovations at KAC follow, to include manufacturing the first helicopter in the world (the K-225) to fly powered by a gas turbine engine. This milestone ushers in a transition of helicopter power from reciprocating to gas turbine engines. In 1954, KAC manufactures and flies the world's first twin-turbine power helicopter, the HTK-1.



Kaman's first helicopter: HTK-125



Kaman's HTK-1

Design and engineering innovations continue, and in 1959, KAC manufactures the first of more than 240 HU2K helicopters, later designated the UH-2A *Seasprite*. In 1973, the *Seasprite* is selected for upgrades and modifications to function as the airborne platform for LAMPS (Light Airborne Multipurpose System) Mk I and enters U.S. Navy service at the height of the Cold War as the SH-2F.

Fast forward to 1996, and that is the year that the NNAM recognizes Charlie Kaman's design genius and record of rotary-wing innovation and accomplishments with his induction into the Naval Aviation Hall of Honor. He joins 80 other remarkable individuals representing every element of the Naval Aviation family, to include pioneers in flight, space, industry and even the 41st President of the United States.

Back to BuNo 151312. In 2015, the Naval Aviation Museum Foundation (NAMF), the charitable and administrative foundation that supports the NNAM, begins discussing how to properly dispose of the growing collection of aging aircraft on outdoor display at the NNAM. Most of the aircraft have been in an unrestored condition and thus experienced extensive environmental damage over the years. BuNo 151312 is no exception, with the Florida sun and salt air taking a toll on its condition the last 20+ years.

The decision was made by the NAMF to approach Kaman Corporation (no longer "just" Kaman Aircraft Corporation) to gauge its interest in taking on the restoration and refurbishment of BuNo 151312. Upon learning of the effort to restore BuNo 151312, the Association of Naval Aviation (ANA) joins in and offers their endorsement of having a *Seasprite* on permanent display at the NNAM. Following discussions in Pensacola and Bloomfield, an agreement is reached in April of 2016 whereby Kaman Aerospace Group (a Division of Kaman Corporation) will restore BuNo 151312 with the understanding that following refurbishment, BuNo 151312 will join the 150+ other beautifully restored aircraft on permanent display inside the NNAM.

Part of the discussions between NNAM officials and NAMF Trustees that lead to the commitment of interior display space for BuNo 151312 was the 40+ year legacy of the *Seasprite*, to include serving as the airborne platform for LAMPS Mk I. The SH-2F not only validated the LAMPS concept, it excelled in its role with surface combatants on 700+ deployments, recording over 1.5M flight hours during the turbulent years of the Cold War.

The NNAM is devoted to the history of Naval Aviation – its mission is to select, collect, preserve and display historic artifacts relating to the 100+ year heritage of Naval Aviation. Since it rolled off the assembly line in Bloomfield in 1959, the *Seasprite* has more than earned the privilege and prestige of taking its place alongside other remarkable aircraft that represent the rich history of Naval Aviation.



BuNo 151312 on outdoor display at the NNAM

So on a January day in 2017, BuNo 151312 was loaded onto a flatbed truck in Pensacola for delivery back to Bloomfield for restoration at the same location where it had been assembled nearly 55 years earlier, aka “the ultimate makeover”. Plans call for a refurbished BuNo 151312 to return home to Pensacola and the NNAM in the March/April 2018 timeframe. The NAMF and NNAM anticipate a ceremony sometime thereafter to recognize the generosity of Kaman Corporation in undertaking the refurbishment and to formally “welcome back” a refurbished BuNo 151312 for permanent display inside of the National Naval Aviation Museum.

NHA and *Rotor Review* will keep all aware on the status/timeframe of the Pensacola ceremony celebrating BuNo 151312, and the *Seasprite's* 40+ year legacy of extraordinary service in the U.S. Navy.

An addendum to our aviation story: while no longer in service with the U.S. Navy, upgraded/modified H-2's are still operated by naval forces in Egypt, Poland, Peru, and New Zealand. Now powered by T-700 engines and equipped with an all-glass cockpit among other mission upgrades, Kaman's SH-2G *Super Seasprite* is projected to be operational well into the 2030 timeframe, 85+ years after Charlie Kaman's invention of the servo-flap controlled rotor.