

U.S. Coast Guard History Program

Minnetonka, 1946



WPG / WHEC-67
Call Sign: NRUP

Minnetonka was named for Minnetonka Lake, Minnesota.

Builder: Western Pipe & Steel Co., San Pedro, CA

Commissioned: 11 July 1946

Decommissioned: 31 May 1974

Disposition:

Length: 254'oa; 245'bp

Navigation Draft: 17'3" max (1966)

Beam: 43'1" max

Displacement: 1,978 fl (1966); 1,342 light (1966)

Main Engines: 1 Westinghouse electric motor driven by a turbine.

SHP: 4,000 total (1945)

Performance, Maximum Sustained: 17.0 kts, 6,157-mi radius (1966)

Performance, Economic: 10.0 kts., 10,376-mi radius (1966)

Fuel Capacity: 141,755 gal (Oil, 95%)

Complement: 10 officers, 3 warrants, 130 men (1966)

Electronics:

Detection Radar: SPS-23, SPS-29, Mk 26, Mk 27 (1966)

Sonar: SQS-1 (1966)

Armament: 1 5"/38; Hedgehog; 2 Mk 32 ASW TT (*Winnebago*, 1966 – most units without TTs)

Class History—“The bow and the stern for each other yearn, and the lack of interval shows...” Myths have long shadowed the design history of the 255-foot class. These cutters were to have been much larger ships, and two theories persist as to why they were shortened. The first is that these cutters were built to replace the ships given to Great Britain under lend lease, and Congress stipulated that the Coast Guard had to build these replacement cutters to the same size and character as those provided to the British. The second is that their length was determined by the maximum length that could pass through the locks of the Welland Canal from the Great Lakes to the St. Lawrence River. The Great Lakes shipbuilding industry brought pressure on Congress to ensure that it had the potential to bid on the contract. The first theory seems to be correct, but the second cannot be ruled out.

The Coast Guard had prepared a design for a 316-foot cutter that was to have been an austere 327. This design was cut down into the 255-foot ship. To accomplish this, everything was squeezed down and automated to a degree not before achieved in a turbo-electric-driven ship.

The machinery design of the 255s was compact and innovative, but overly complex. It had pilothouse control, variable-rate (10 to 1) burners, and automatic synchronizing between the turbo-generator and the motor. Westinghouse engineers developed a system of synchronization and a variable-frequency drive for main-propulsion auxiliary equipment, which kept the pumps and other items at about two-thirds the power required for constant-frequency operation. The combined boiler room/engine room was a break with tradition.

The turbo-alternators for ship-service power exhausted at 20 psi gauge pressure instead of into a condenser. This steam was used all over the ship before finally going to a condenser. Space, heating, galley, cooking, laundry, freshwater evaporation, fuel, and feed-water heating were all taken from the 20 psi backpressure line.

The 255-foot class was an ice-going design. Ice operations had been assigned to the Coast Guard early in the war, and almost all new construction was either ice-going or ice-breaking.

The hull was designed with constant flare at the waterline for ice-going. The structure was longitudinally framed with heavy web frames and an ice belt of heavy plating, and it had extra

transverse framing above and below the design waterline. Enormous amounts of weight were removed through the use of electric welding. The 250-foot cutters' weights were used for estimating purposes. Tapered bulkhead stiffeners cut from 12" I-beams went from the main deck (4' depth of web) to the bottom (8" depth of web). As weight was cut out of the hull structure, electronics and ordnance were increased, but at much greater heights. This top weight required ballasting the fuel tanks with seawater to maintain stability both for wind and damaged conditions.

The superstructure of the 255s was originally divided into two islands in order to accommodate an aircraft amidships, but this requirement was dropped before any of the units became operational. Construction of this class received a low priority, and none of the cutters served in the war. Following completion of the preliminary design by the Coast Guard, the work was assigned to George G. Sharp of New York to prepare the contract design.

The number of units – 13 of them – had an interesting origin. Three were to have been replacements for over-aged cutters, the *Ossipee*, *Tallapoosa*, and *Unalaga*; ten units were to be replacements for the 250-foot class transferred to Great Britain under lend-lease. For economy, all 13 units were built to the same design.

Cutter History:

Minnetonka was originally named *Sunapee*. She was stationed at San Pedro, CA, from 20 September 1946 to 7 March 1951. She was used for law enforcement, ocean station, and search and rescue operations in the Pacific.

On 2 and 3 January 1951, she assisted M/V *Keisin Maru* at 38°41'N, 152°00'E. From 23 to 15 January 1951, she assisted M/V *Oregon Mail* at 46°35'N, 166°34'E. From 7 March 1951 to 31 May 1954, the *Minnetonka* was homeported at Long Beach, CA, and used for the same duties as listed above. On 8 September 1954, she assisted F/V *American* at 33°08'N, 120°44'W. From 6 to 8 May 1955, she patrolled the Ensenada Race. On 24 August 1956, she towed the disabled schooner *Atlantic* to Kodiak, AK. On 8 November 1957, she searched for the Pan American stratocruiser *Romance of the Skies* between San Francisco and Honolulu. 19 bodies were recovered on the sixth day of the search.

On 8 July 1959, she towed the disabled F/V *Ruth K* to Long Beach, CA. On 17 and 18 December 1959, she assisted M/V *Guam Pioneer* at 31°23'N, 124°37'W. On 28 and 19 August 1961, she towed the disabled F/V *Alaska Reefer* to Port Townsend, WA. On 11 and 12 February 1962, she assisted F/V *Western Fisher*. She served on the reserve cruise from 10 to 13 August 1962. On 30 July 1967, the *Minnetonka* rescued six from F/V *Sea Boy* off California.

She was assigned to Coast Guard Squadron Three, Vietnam, from 5 January to 29 September 1968. On 1 March 1968, she forced an enemy trawler to abandon its supply mission. A fatal accident occurred on 20 June 1972. One was killed and two were seriously injured when a hot-water heater exploded while the cutter was in Long Beach.

Photographs:

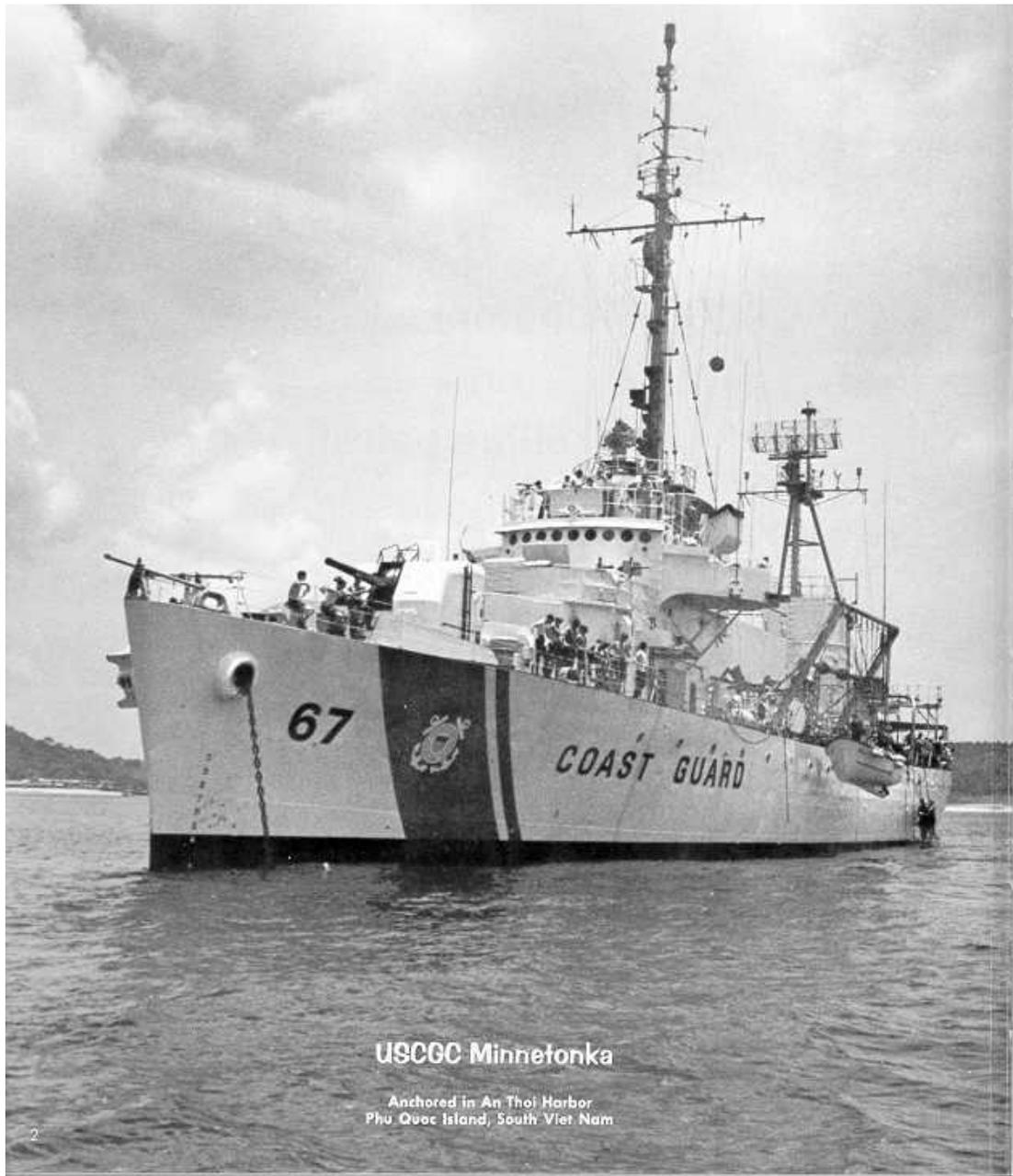


Minnetonka, 16 September 1958. Photo No. 091658-01. No caption.



No caption [The *Minnetonka's* 5-inch/38's barrel after firing continuously overnight.]

Minnie Log USCGC Minnetonka Whec-67 on Marketime patrol; Viet Nam Deployment with Coast Guard Squadron Three [Cruise Book]; December 17, 1967 to October 17, 1968, page 41.

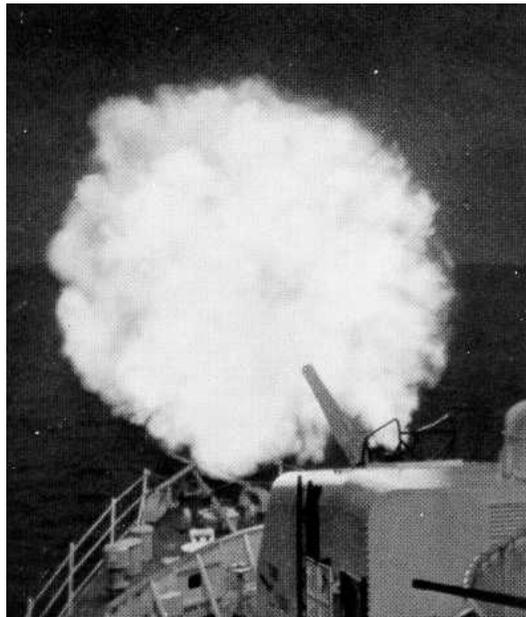


"USCGC *Minnetonka*: Anchored in An Thoi Harbor, Phu Quoc Island, South Viet Nam."

Minnie Log USCGC Minnetonka Wmec-67 on Marketime patrol; Viet Nam Deployment with Coast Guard Squadron Three [Cruise Book]; December 17, 1967 to October 17, 1968, page 2.



No caption [The *Minnetonka* conducts another naval gunfire support mission.] *Minnie Log USCGC Minnetonka Whec-67 on Marketime patrol; Viet Nam Deployment with Coast Guard Squadron Three* [Cruise Book]; December 17, 1967 to October 17, 1968, page 43.



No caption [Night-firing the *Minnetonka*'s 5-inch/38 on suspected Viet Cong positions.] *Minnie Log USCGC Minnetonka Whec-67 on Marketime patrol; Viet Nam Deployment with Coast Guard Squadron Three* [Cruise Book]; December 17, 1967 to October 17, 1968, page 43.



"Our third patrol area was in the Gulf of Thailand. It was here, in April and May, that we first used our five inch gun heavily in Naval Gunfire Support missions. By the time that the MINNETONKA shot her last shell in September, she had fired more than any other ship on Operation Market Time. The 4,684 rounds from the five inch gun yielded good results: 56 enemy killed or wounded in action, 279 enemy structures destroyed or damaged, 31 enemy bunkers destroyed or damaged, 48 enemy sampans destroyed or damaged, 14 fires started and 1,930 meters of trenchline or trails destroyed. The aircraft spotters consistently praised our marksmanship. The gun barrel was subjected to so much use, that we needed to have a new one placed in the mount when we returned to Subic Bay in September."

Minnie Log USCGC Minnetonka Whec-67 on Marketime patrol; Viet Nam Deployment with Coast Guard Squadron Three [Cruise Book]; December 17, 1967 to October 17, 1968, page 41.



Minnetonka, 9 April 1966. Photo No. 57-66. Neg. #11CGD-040666-1. Caption states: "RETURNS HOME: The Coast Guard cutter *Minnetonka* slowly approaches her home port moorings at Long Beach. The 255-foot vessel returned to the city after nearly three months' deployment on Ocean Station Victor in the North Pacific. While patrolling the 44,000-square mile patch of ocean, the *Minnetonka* served as a navigation fix for wayward aircraft and mariners. She also performed numerous weather and oceanographic experiments while underway. The cutter displays the Coast Guard's new visual identification markings on her forward hull. She is the first of the service's vessels on the West Coast to participate in a limited program to test public reaction to the new trim."

Sources:

Robert L. Scheina, *U.S. Coast Guard Cutters & Craft of World War II* (Annapolis: Naval Institute Press, 1981), pp. 1-3.t

Robert L. Scheina, *U.S. Coast Guard Cutters & Craft, 1946-1990* (Annapolis: Naval Institute Press, 1990), pp. 18-26.

255' Cutter Sailors' Page, hosted by 255' cutter historian Doak Walker, RMC, USCG (Ret.):
255wpg.11.net.com/

Cutter File, Coast Guard Historian's Office.

Ship's Characteristics Card.

