



Carlyle House

DOCENT DISPATCH

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Spies and Secret Communications during the Revolution

By Mark Hill

This past spring, some of you may have watched the AMC original series “*Turn*” which portrayed several key players of General Washington’s first espionage network (i.e., The Culper Spy Ring) during the Revolutionary War. That series and the book that provided the foundation upon which *Turn* was based (*Washington’s Spies* by Alexander Rose), and some encouragement from Helen Wirka, spurred me on to write this article (a few of the Carlyle House community even read and discussed this book recently during one of its book club sessions).



“Know Thy Enemy”, the aphorism made famous by Sun Tzu (author of *The Art of War*), is especially applicable to General Washington’s desire, and the fledgling nation’s dire circumstances requiring it, to obtain any intelligence on the intentions of the British military in North America throughout the Revolutionary War. While “spies” have been deployed by nations and militaries for thousands of years, you may be surprised at some of the surreptitious methods that were used by

Washington’s spy network to gather and relay information back to enable the commander to make the best use of such intelligence.

One of the major events impelling Washington to ratchet up his intelligence activities was the advent of the British attack on New York City (then located in present day Manhattan). In September 1776, the supreme commander of British armed forces in North America, General William Howe, had amassed his superior military regiments (superior both in size and experience) across the East River from Washington and his troops. There were several different tacks the British general could take—land in the City then advance northward (through present day Bronx), land up north then move south to the City, or do both maneuvers and catch the Americans in a pincer movement. General Washington needed some

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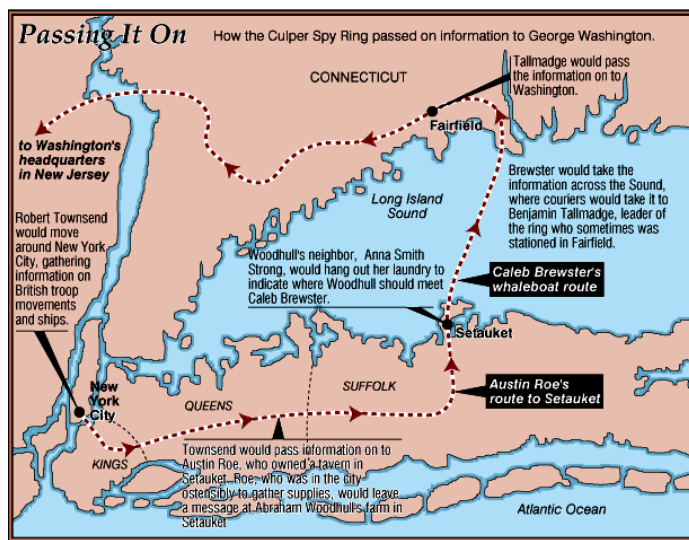
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intel, and in a timely manner, on which way, or ways, the British leadership was leaning and needed to plan his troop allocation and positioning accordingly to stave off the inevitable attack. He had ordered Generals William Heath and George Clinton to establish a “channel of information” on Long Island, pointing to possible “friends” behind British lines that could both gather information and route it back to headquarters in a most expeditious manner. General Washington had relied considerably upon information extracted from deserters and prisoners, as well as from overnight forays behind enemy lines. But this intelligence often was of little use and Washington was feeling the pressure to obtain accurate information on the Britishers’ positions and movements.

participation. Enter Nathaniel Sackett, a member of New York’s Committee for Detecting and Defeating Conspiracies. General Washington, based on a colleague’s recommendation, selected Mr. Sackett to manage the Continental Army’s intelligence gathering efforts. Intelligence gathering behind the British lines in New York and Long Island basically consisted of both watching and listening for any clues that pertained to British troop movements or their numbers. Such information gatherers would need to be equally attentive as well as “chameleonic”, i.e., blend in with the landscape and not attract attention through spoken word or deed. Seeing the need for the new intelligence head to have a deputy in order to assist in relaying messages from the “observers” to headquarters, Washington appointed Captain Benjamin Tallmadge of the Second Continental Light Dragoons to fill this role. (Capt. Tallmadge, incidentally, was a Yale classmate and close friend of the high profile American spy, Nathan Hale.) Later, in 1778, Tallmadge was instrumental, through his network of childhood friends from the Long Island town of Setauket, in setting up what has been designated as Washington’s “first spy network”, The Culper Spy Ring.



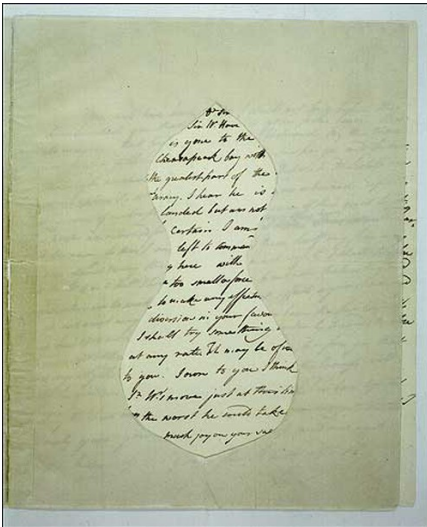
It wasn't until early 1777 when Washington was able to assemble a formal intelligence gathering apparatus—and one that included significant civilian

Modes of Secret Communications

To evade detection by the British, especially when persons were stopped at checkpoints going in and out



of British-occupied areas (e.g., New York City, Long Island), Washington’s spies would use some form of code, or even cloaked writing methods. Often, such operatives’ correspondence would include either inverted initials (say, “J.G.”, for “George Johnson”) or had entirely different names ascribed to them. For example, in the Culper Spy Ring, the behind-the-lines



A masked letter sent by General Henry Clinton, 1777.

spy, Abraham Woodhull, was given the “spy name” of “Samuel Culper.” In addition, 3-digit numbers were used to represent things, places and names (e.g., “727” for New York city, “722” for Abraham Woodhull/Samuel

Culper, “522” for ships, “711” for George Washington). If intercepted, the meaning of a correspondence from “Samuel Culper” would be nearly impossible to ascertain. Here is an example passage: “There [has] been no augmentation by 592 (ships) of 680 (war) or 347 (land) forces ... Every 356 (letter) is opened at the entrance to 727 (New York) and every 371 (man) is searched, that for future every 356 (letter) must be 691 (written) with the 286 (ink) received. They have some 345 (knowledge) of the route our 356 (letter) takes.”

Another approach used was to place a designated template in the shape of an hour-glass over a correspondence including secret messages. The letter, in toto, did not appear to convey any important information, but when read in the confines of the template would provide the hidden meaning.

Perhaps the most advanced espionage tool of trade used by Washington’s intelligence arm, as well as American diplomats, during the Revolutionary War was invisible ink. The preferred method was for the secret information to be written in invisible ink in between the lines of the seemingly innocuous letter contents. The basic approach was to write in invisible inks such as lime juice, milk or, in the case of Silas Deane, one of the American diplomats in Paris, cobalt chloride mixed with glycerin and water. The receiver of the letter merely had to apply heat to reveal the secret message, but would need to exercise caution as application of heat would make the paper



An image illustrating the use of invisible ink.

brittle. A more sophisticated approach was to use invisible inks that were impervious to heat and required application of a “reagent” (pronounced “re-agent”) to reveal the cloaked message. Such inks would consist of, say, gallo-tannic acid, which was made out of powdered nutgalls (extraneous growths usually found on oak trees, created by parasites) diluted in water. The reagent would be an iron sulphate solution. By application of the ferrous sulfate over the invisible inked area, the reagent would react with the diluted gallo-tannic acid to form ferrous gallo-tannate which would make the original writing visible. Washington procured his first batch of the invisible ink and reagent (which he referred to as a “counter-liquor”) from John Jay, the prominent



statesman who served as President of the Continental Congress, whose brother, James Jay, a physician based in England, had developed such liquids and successfully communicated to the Continental Congress a hidden message about Britain's intentions with respect to the North American colonies ("... reduce them to unconditional submission") during the early days of the Revolution.

Relaying the Message

Intelligence gathering behind enemy lines is difficult enough; perhaps even more challenging was to get the information back to Washington's HQ, and in a timely manner. In several instances, General Washington issued grievances regarding the timeliness of the intel provided to him, as often it was of little use by the time he received it.

Understandably, there were several checkpoints and circuitous routes that spies needed to take in order for the message to arrive at HQ without compromising the spy network.

In the Culper Spy Ring, the operators would have to go through sometimes more than one checkpoint to get intelligence out of New York City and route the information to the Long Island town of Setauket. Once delivered at Setauket (sometimes in the form of a "dead drop," e.g., dropped in a box in Abraham Woodhull's farm field), Abraham Woodhull (aka Samuel Culper), would add some notes to the correspondence, then determine if a boatman was ready to pick up the message at a designated cove. To effectively announce his arrival to "Samuel Culper", the boatman would have a local woman hang a black petticoat on her clothesline. In addition, she would hang a number of handkerchiefs to indicate which cove to find the boatman. After pick-up and transport over the Long Island Sound to

Connecticut, the message was delivered via horse-borne courier to Capt. Tallmadge in the town of Fairfield, then to General Washington, via a "post" system (i.e., horse riders staged at intervals of, say, 15 miles, to speed up the transport time).

While no one from the Carlyle family served their nascent nation as one of Washington's spies, it should be noted that being a courier of sensitive military information, whether gathered behind enemy lines or provided by one's own side, was a very important position and was fraught with potential dangers at every turn. In July 1781, young George William Carlyle (15 years old at the time) delivered very important letters, at least once, from the General Marquis de Lafayette and James McHenry (an aide to both Lafayette and Washington) to General Nathanael Greene, commander of all Continental Army forces in Virginia and the Carolinas. While these messages were not in cipher, they did include very sensitive information on American troop movements throughout the Southern theater of war, as well as on the American perception of where General Cornwallis was moving his troops and the numbers ascribed to his command. George William Carlyle carried such letters from Williamsburg to General Nathanael Greene's HQ in South Carolina (about 60 miles northwest of Charleston), a trip of about 300 miles and through parts of the Carolinas that were, while not the bastions of Loyalism as seen in New York City and Long Island, at least sketchy as to where the inhabitants' loyalties lay. So the youthful soon-to-be cavalryman from Alexandria for Nathanael Greene had to be ever vigilant with his precious cargo!

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