DOMESTIC MAP CENSORSHIP IN WWII

by David Smollar

Unfold a 1944 map of San Diego County by the Automobile Club of Southern California for members and look for Lindbergh Field, the port, the Naval Training Station or Marine Corps Depot. You won't find them. Nor can you locate Fort Rosecrans, Camp Kearny, Naval Hospital, the Navy Ship Repair facility, Camp Pendleton Marine Base, or the 29 other U.S. military installations in the region nicknamed "Defense City No. 1" during World War II.

Now, unfold a similar-looking 1944 map of San Diego County by the Auto Club, prepared for the military. There's the same cover and legend box as the first, but every airfield, military base and pier is clearly marked and indexed.

You've stumbled across map censorship, a little-known relic of WWII on the American homefront. In an era when Google Earth and GPS offer instant mapping worldwide, the idea of censorship in the United States comes off as ludicrous. Yet following the December 7, 1941 Japanese attack on Pearl Harbor, map masking—as the practice was called—became official wartime doctrine for road and other maps issued in the U.S. for non-military use. These types of maps, distributed for free mostly at gas stations, had proliferated in the 1930s as auto tourism grew alongside the sales of motor vehicles.

Early in 1942, the nation's first voluntary censorship code was distributed by the U.S. Office of Censorship, created by President Franklin Roosevelt in the immediate aftermath of Pearl Harbor. Mapmakers, along with journalists and other purveyors of information, were asked to remove locations of munition dumps, armament factories, airports and restricted Army or Navy areas. The Code of Wartime Practices was philosophically self-policing: media were to ask themselves, "Is this information that I would like to have if I were the enemy?" and act accordingly, says historian Michael Sweeney, whose book "Secrets of Victory" examines the bureau.

In practice, National Archives documents make clear that the censorship office worked closely with military authorities to encourage approval of maps before publication. But the office was slow to staff positions, and initial guidance regarding maps fell solely to Army and Navy officers, who erred on the side of removing anything remotely considered of military interest to enemies. Those officers continued to review submissions even after the office grew to full strength, as there were fewer than a half-dozen employees tasked with overseeing maps, and they were also dealing with a vastly greater number of newspaper and radio issues. As a consequence, policy implementation would at times leave mapmakers uncertain, with inconsistent recommendations from military and civilian authorities. It led to remarkable differences among oil company road maps by the nation's three main cartographers—Chicago's H.M. Gousha and Rand McNally, and New York's General Drafting—as to which, if any airfields, Army or Navy bases, ports, fuel dumps and related facilities disappeared. Maps from regional and local

mapmakers displayed an equally contradictory pattern, often because their maps were never submitted at all.

For example, in 1942, files from Chicago's Newberry Library show 27 road maps printed for Illinois and Chicago. Eleven were censored (masked) for airfields and/or military bases; 16 were not. Among 19 maps distributed for Michigan and Detroit, 11 were censored, eight were not. For the 23 maps for New York and New York City, 16 were censored, seven were not. Similar patterns occurred for almost every state and major metropolitan region.

At the time of Pearl Harbor, major cartographers were in the midst of finalizing maps for 1942. The three giants immediately realized that wartime would bring paper shortages, gasoline rationing and a crimped market for tourism and oil company maps. General Drafting and Gousha hurried to issue their 1942 editions while transitioning into exclusive military contract work. Neither company produced oil company maps again until late 1945. Rand McNally, with the largest portfolio of road maps, continued with a smaller number throughout the war, and its interactions with the Office of Censorship best illustrate why inconsistencies exist among wartime maps. The Auto Club of Southern California was already working with engineers from the Western Defense Command to craft tens of thousands of maps for the military, which had an oversized presence in California with more than one hundred training facilities. Club cartographers ended up designing two sets of maps: fully-detailed renderings of the state, its counties and cities for the armed forces, and censored editions for civilians, such as the 1944 San Diego map.

General Drafting, the smallest of the three companies, produced maps primarily for oil behemoths Esso and Mobil. In his self-published history, General Drafting founder Otto Lindberg wrote that the company fulfilled its contract commitments for 1942 road maps soon after Pearl Harbor, and turned quickly to making maps for overseas war theaters for the Army Map Service through the war's duration.

This would seem to explain why none of its 1942-coded maps appear masked even though they covered states and regions with significant military and war-related industrial targets, including New York, New Jersey, Pennsylvania, Washington, D.C., Chicago and New England. The maps would have been finalized and issued before the censorship office had promulgated the first guidelines.

However, National Archives records contain correspondence from early 1942 between Lindberg and the War Department, and show a more complicated WWII story than Lindberg indicated. In a February 13 letter, the Army colonel in charge of the department's Review Branch asked Lindberg for his cooperation in "deleting references to military installations," particularly for Picatinny Arsenal, after reviewing a proposed Standard Oil of New Jersey (Esso) state map submitted by General Drafting. Col. Falkner Heard wrote that "the War Department has no objection to maps showing the locations of Army posts, camps and stations, provided that no indication is given as to the strength of the military forces, and that the locations of military flying

fields are not revealed." As to Picatinny, he strongly urged removal of "the small type giving the names and location of this arsenal," which the government had expanded in 1941 by taking over the northern New Jersey village of Spicertown, adjacent to the town of Picatinny.

General Drafting issued two versions of 1942 maps each for Pennsylvania, New York, Metro New York City and New Jersey, one edition clearly dated on the front cover and the other coded only in small "142" lettering along the map edges. For each state, both versions appear to be identical, and it cannot be determined which were published first. Neither New Jersey map shows the Picatinny Arsenal or adjoining towns, all which had appeared on the 1941 issue, so Lindberg must have removed the identifications and that the maps must have been issued after February 14. But the state's airports and bases remained labeled despite the Army's explicit request to censor airfields. (Gousha maps eliminated the town of Picatinny but kept Spicerville. Some Rand McNally maps kept Picatinny town; others masked it.)

For General Drafting, masking of Picatinny Arsenal proved an exception. Every one of its 1942 maps, with or without cover dates, labeled all civilian and military airports, and military bases, no matter the Esso, Sohio, Mobil-Socony or Standard Oil of Kentucky client. Both versions of Esso's New York State map identified the Army's large Watervliet Arsenal near Albany. There is no correspondence in the National Archives regarding reviews of these General Drafting maps, and Lindberg made no reference to wartime masking in his history. The cartographer produced no road maps in 1943 or 1944, and the first post-war maps in fall 1945 were reprints of 1941 and 1942 issues.

The Rand McNally story is far more complex.

The venerable cartographer produced road maps for numerous large oil companies. The Newberry's 1942 collection covers Texaco, Gulf, Sinclair, Amoco, Atlantic, Marathon, Sunoco, Pure, Johnson, Union, Standard Oil of Indiana and Richfield. (Richfield had its West Coast maps drawn by Gousha and SOI also had certain maps from Gousha as well.) in addition, Rand McNally produced maps under its own imprint as well as for hotels, airlines and railroads.

At first blush, the 1942 Rand McNally issues for oil companies seem all over the "map" in terms of censorship. Some examples:

- --For Illinois and Chicago: four masked, six unmasked. A motorist picking up a Chicago map from a Pure Oil dealer found all airports and Navy bases neatly marked and labeled. The same stock map from a Johnson Oil or Marathon station showed no air fields, but identified Army and Navy bases. A Chicago inset on a Pure Oil Illinois state map showed the faint outlines of airfields despite the cartographer's intent to black them out.
- -- For Indiana: five masked, three unmasked. Sunoco dealers distributed a masked state map while Sinclair's version was uncensored, though it included a statement exhorting conservation for the war effort.
- --For Michigan and Detroit: four masked, six unmasked. Standard Oil of Indiana maps deleted

no air fields, bases or industrial plants. Maps for Johnson and Marathon oils were masked. A Sinclair version masked Detroit airports but, like the Standard Oil map, identified every defense plant in the city, where all auto plants had been converted to vital tank, truck and related war production.

However, the Newberry's extensive Rand McNally files contain clues to unravel the mystery of map variations, not just for these three states and cities but nationwide. The archives include a 100-page-plus list from Rand McNally of publishing dates for maps annually between 1938 and 1966. The compilation is not exhaustive; for 1942, it only lists road maps for eight of 12 oil companies, and not all the maps for any one company.

Nevertheless, by comparing publishing dates to actual maps in the Newberry collection, it becomes clear that Rand McNally began to heavily censor maps issued from early March forward, and almost uniformly for airfields, after the initial censorship office Code had been widely disseminated and discussed. Until that time, the differences from map to map—whether masked at all, or the level of masking—apparently depended on whether it had been reviewed, or whether a civilian in the office or a specific military officer had conducted the review.

From National Archives documents we know that Rand McNally stationed two full-time agents in Washington, DC, to liaison among the War and Navy departments, and the censorship office. As early as the first week in January, they were communicating with the War Department over the number of Army camps that had been cleared for public knowledge, and therefore were permissible to include. In early February, Rand McNally complained to the nascent censorship office that proposed maps sent to the Army's Quartermaster General's office were being more rigorously scrutinized than those being handled by the Army's Review Branch—in essence, it was asking for more consistent guidance. Rand McNally Agent William Tufts argued that the company has "taken great pains to consult in advance with the War and Navy departments and we shall continue the same policy with your office." Tuft referenced the company's submission of maps for Richfield, which when issued six weeks later in mid-March were masked.

On February 14—a day after the War Department letter to Lindberg at General Drafting—Col. Heard warned Rand McNally to limit the information about Army camps to their geographical location, and to delete all airfield symbols, even if the information had been previously published before the war. The company subsequently even sought approval in advance to show the locations of defense housing projects in Washington, D.C. and Ogden, Utah. (The 1943 Union Oil maps of Los Angeles and San Diego did not show locations of such projects.)

All but two of Rand McNally's 1942 maps for Atlantic Oil were issued on February 23, 1942. They were unmasked. The two issued in March—for New Jersey and Philadelphia—were masked; airfields and naval bases had been deleted. Amoco's 1942 maps were issued between March 10 and March 30; all were masked. Maps for Pure and for Standard Oil of Indiana were completed by February; none were masked save for Pure's Chicago inset with the haphazardly-done blackouts. All eight Marathon state maps and nine of ten Johnson Oil maps

(save Wisconsin), were published in late winter/early spring and had airfields deleted. Sinclair issued some 30 maps; the two-thirds published after March 20 were censored. Sunoco's 14 state and city maps appeared in May and June and all were masked.

Texaco issued nearly three-dozen maps through the first half year. Those printed by January 2 were not censored, even for Oregon and Washington along the West Coast, where censorship was early and consistent both by Rand McNally and Gousha due to a widespread perceived threat of sabotage and/or invasion from Japan. (The Army's Western Defense Command reviewed West Coast and Mountain States maps.) A Texaco map for Connecticut, Rhode Island and Massachusetts and a separate Maine-New Hampshire-Vermont map, both issued January 2, showed all airports and bases. However, a revised Texaco map for New England issued June 8, with all six states included, was masked. By mid-March, Texaco maps were showing consistent masking. The earliest masked Texaco map was a Washington DC & Vicinity issue of March 2—it turned out to be the most thoroughly censored WWII map for the nation's Capital. (Ironically, all but a handful of Capital maps by any cartographer were not masked.)

Similarly, Rand McNally published maps for Gulf Oil through mid-1942, with early unmasked versions, such as a New England issue in January, superseded by censored versions by late spring. Union Oil maps, which covered much of the West—including California, Idaho/Montana, Arizona/New Mexico, Washington, Los Angeles, Sacramento, San Francisco, Tacoma, Spokane, Seattle, and San Diego—all had April 3 publishing dates and all were substantially censored.

By mid-1942, Rand McNally and the censorship authorities had ironed out many of the kinks and uncertainties. But conflicts remained at times throughout the war, especially since Rand McNally was the only big three cartographer to issue maps in 1943 and 1944—for Texaco, Gulf and Union. While the censorship office routinely continued with War and Navy department personnel performing reviews of submitted maps, it retained final approval or disapproval. Rand McNally representative Helmut Bay complained in April 1943 that the military had reversed course on the number of camps and facilities that could be identified on maps. Bill Steven of the censorship office wrote a follow-up memo to colleagues saying that "this seemed to be silly and that I doubt this office would find objection to locating, in a general way, camps and industrial plants already announced by the War Department." A February 3, 1943 revision of the wartime practices code had liberalized exemptions to masking. "I told Mr. Bay that this office would be the final judges of security in such matters," Steven added, and noted that Bay seemed "a little timid" about sparring with military authorities directly on the matter.

In fact, all of Rand McNally's 1943 maps were mostly re-issues of 1942 stock maps and all were masked even if the 1942 versions were not—17 for Texaco and six each for Gulf and Union. The cartoon cover illustration for the 1943 Union Oil street maps of San Diego, Los Angeles and San Francisco humorously—if unwittingly—summed up the situation. It showed a sailor, a soldier and a defense worker puzzling over a map they were holding. In 1943, those maps would have masked their base and plant locations. A 1943 Texaco dual city map of Houston

and San Antonio was remarkable in its reference to censorship. It outlined Fort Sam Houston's acreage in San Antonio, but with no identifications of any base streets or buildings. Rather, there was an overlay text box in the blank space that read, "Details deleted by order of War Department." This is only one of two war-era maps found that specifically cites mandatory censorship, as opposed to statements on Gousha's Shell and Chevron maps that refer to "voluntary cooperation" with military authorities. The second is a 1942 Detroit street map from Sauer Brothers that stated "in compliance with the Federal Censorship, the publishers have deleted the location of all docks, depots and industrial sites from the map for the duration." (In contrast, a competing 1942 Detroit street guide by National Lithograph had only partial masking and no statement regarding omissions.)

By mid-1944, the guidelines had been loosened considerably. The military had approved public identification of many more domestic camps and bases, as invasion fears no longer existed and sabotage concerns largely disappeared as well. Rand McNally issued more than 20 maps for Texaco, almost all first-time multi-state or multi-city issues to conserve paper as wartime rationing remained acute. All appeared in late 1944 and none were masked. The Calfornia/Nevada/Oregon/Washington and California/Nevada/Arizona/New Mexico maps were notable for being the first to show the many military airports and bases set up in California after Pearl Harbor, including the sprawling Camp Pendleton base between San Diego and Los Angeles. Rand McNally also issued 16 Gulf maps in 1944—some masked, others not—depending on whether they appeared in the first or second half of the year.

Rand McNally resumed road map production on a large scale in mid-1945. Maps for Texaco and other large companies were no longer masked but because of production crunches, some state maps for smaller oil firms were reissues of wartime stock versions and remained masked until they could be updated in 1946.

(The pell-mell nature of Rand McNally's wartime production apparently resulted in a lack of attention to the company's documentation of WW II activity. In 1978, a Wisconsin map collector wrote the Rand McNally archivist to ask whether the company had issued wartime road maps. She replied that veteran employees had told her that "no road maps were produced in 1943, 1944, or 1945. The road map personnel spent those years working on maps produced for the U.S. military. I feel quite sure this information is accurate, but if you should ever come across a Rand McNally road map produced during those years, please let me know.")

As for Gousha, the Newberry has complete sets of 1942 company maps for 14 oil firms supplied by the cartographer. The collection shows that identical stock maps by Gousha was either masked or left uncensored depending on the oil company brand. Companies whose collections were all or largely censored included: Shell, Cities Service, Associated-Tidewater, Skelly, Standard Oil of California/Chevron, Richfield and Kendall. Maps under the Conoco, DX, Phillips, Bareco, Globe, Standard Oil of Indiana, PanAm and Rio Grande brands were almost all unmasked. (Gousha produced five civilian non-oil company road maps in 1943 and 1944, and only a limited number of reprints in 1945 for Shell (11), Conoco (17) and SOI (2)).

Take the 15 Gousha-produced maps in 1942 for Illinois and Chicago: five eliminated airfield and/or base locations, and ten did not. Among Gousha's nine North Dakota maps: five masked facilities, and four did not. For its seven Michigan and Detroit maps: five were masked, and two were not. Select almost any state, and Gousha maps will exhibit the same pattern, except for Pacific Coast and Mountain West states where almost all maps were masked due to the heavy presence of the Western Defense Command.

Gousha affiliates with the largest number of 1942 maps were: Shell with 55, Conoco with 37, Cities Service with 34, Associated with 27 and Phillips with 21. All but seven of the Shell maps masked both airfields and all military bases, with a statement about voluntary removal on their covers: "all points of military interest have been removed voluntarily from this map and index." The fact that seven Shell maps went uncensored—Seattle, Missouri, Washington DC, Pennsylvania, Texas/Oklahoma, Indiana and Wisconsin—appears to have been inadvertent, due to a time crunch at Gousha with harried employees simultaneously rushing to alter road maps while gearing up to fulfill military demands for vital overseas charts. This seems to be borne out by the fact that when Gousha reissued 11 of the 1942 Shell maps in 1945, the Indiana and Wisconsin maps were now censored and included the cover statement, at a time when masking was no longer required by the censorship office. The 1942 Shell city map for San Francisco was scrubbed of more than a dozen military bases, airfields and ship repair sites. But Gousha's Standard Oil version for the city still included San Francisco's Presidio military reservation, Fort Winfield Scott and Fort Mason—a huge supply and troop embarkation depot—even though the Standard map displayed its own front cover notice that "in cooperation with the United States military authorities, we have eliminated from this map all airports and establishments which they have suggested." The ironies of wartime masking are perhaps illustrated best by the Annapolis inset on the Shell Baltimore city map. There is no identification for the US Naval Academy campus, but its iconic street names after naval heroes, such as Decatur Road, were left intact. (By contrast, Shell's 1942 Baltimore map for the city's Chamber of Commerce has no military deletions.)

Gousha's Associated-Tidewater maps in 1942 featured a Minuteman statue on the front cover and all masked airfields and military bases. In contrast, Gousha's masked only seven of Conoco's 37 maps, all in the West, and only three out of 21 for Phillips: Utah, Montana and Arizona. Furthermore, the unmasked Gousha maps for 1942 identified airports by importance, a change from 1941, using two symbols: one for "primary" and a second for "other." Even where Conoco maps were masked, inset maps on them were not, attesting to the haste in revisions. This is especially glaring with California/Nevada, where the main map was censored but the insets for San Diego, Los Angeles and San Francisco showed all military and civilian air fields and military bases. Indeed, the Conoco issue was the only 1942 map of California for any oil company that showed such national defense locations, although Gousha's Rio Grande map left intact gray-shaded areas where airfields existed while deleting the text identifications. The 14 unmasked Bareco oil state maps were the closest to basic unmasked Gousha stock maps for 1942, prepared before Pearl Harbor. Both the index box and the compass rose featured Gousha

symbols, not replaced by the oil company logo as with other brands.

Why did Gousha's masking differ so drastically depending on brand? Unfortunately, neither Newberry nor the National Archives have any correspondence among the company and the War or Navy departments or censorship office. Were maps from uncensored oil companies prepared ahead of the masked maps for other firms, in late 1941 or early 1942, without the benefit of communication with government authorities? It's probable, based on the Rand McNally experience. The early masking for West Coast issues, even for brands otherwise left largely uncensored, could reflect the fact the Western Defense Command wielded quasi martial-law control over the region.

The close cooperation between the Auto Club of Southern California and the Western Defense Command was documented by the organization in 1945. The liaisons began in June 1941 when coastal defense planning accelerated in the face of increasing concerns about a Pacific conflict, and kicked into high gear after Pearl Harbor. The Auto Club supplied the military with 231,000 total maps, including more than 11,000 "blue line" large-scale original copies of all Southern California counties, the city of San Diego, and the Los Angeles-Long Beach Harbor, among others. The voluntary censorship is hinted in the club's description of drafting work that followed field surveys for wartime maps: "culture and name deletions and additions." Those deletions even encompassed dams, aqueducts, irrigation canals and oil fields, which Gousha and Rand McNally maps kept. It's logical to assume that the censored Auto Club items reflected the better-safe-than-sorry judgments of the Western Defense Command's mapping engineers who worked alongside club cartographers. But even the Auto Club could slip up, as it did with several pre-War maps it masked and reprinted. The Kern County map dropped the locations of the U.S. Army Bombing Range near Mojave, the vast Ten Sections Oil field and Taft Airport. Yet the three places with their map coordinates remained in the index. Similarly, the censored San Luis Obispo County reprint masked the Army's sprawling Camp Roberts facility, but it was still indexed. The Western Defense Command carried out the only after-publication censorship of a map during WWII. It seized 5,000 copies of the January 2, 1942 Los Angeles Times intended for overseas subscribers, and forced the paper to cut from each a map that showed locations of military airfields, Navy bases and Army camps in California, using information the military had supplied just prior to Pearl Harbor.

Did the mixed results of map masking even matter? Thousands of easily-obtained pre-war road and U.S. Geological Survey Maps existed, and Axis intelligence no doubt knew the locations of existing military targets, similar to what U.S. military planners undoubtedly possessed concerning its enemies. American General Mark Clark recalled that troops used Esso (Standard Oil of New Jersey) road maps of Louisiana during massive training maneuvers in 1941 because the Army had nothing better. A 1942 Congressional committee displayed a pre-war Japanese map of California pinpointing air fields, barracks and factories. But the Code did keep key post-Pearl Harbor bases and plants, including the atomic weapon laboratories at Oak Ridge, Tennessee, Hanford, Washington, and Los Alamos, New Mexico, off maps and perhaps thwarted potential sabotage.

Admittedly, the threat of invasion or bombing along the East Coast or in interior regions of the country were never high, though acts of sabotage were attempted and German submarines wreaked havoc on Atlantic Coast shipping for much of 1942. For the West Coast, there existed palpable fear among both military officials and the civilian population of a Japanese invasion in the months following Pearl Harbor. In February 1942, a Japanese submarine lobbed shells at oil facilities near Santa Barbara, and other subs that spring probed harbor defenses up and down the coast while sinking a few tankers. Nervous civil defense authorities issued numerous false alarms statewide about air attacks during the same period. The Auto Club posted coastal highway signs for the military warning drivers of the dangers of isolated beach landings by enemy saboteurs. The threat of air attack or invasion did not end completely until after U.S. forces retook Japanese-held islands in the Aleutian chain in mid-1943, although the threats had diminished significantly following the June 1942 defeat of a large Japanese naval force near Midway Island west of Hawaii.

The wartime masking experience illustrates the difficulty of map/media censorship in a democracy, especially when the process is at once voluntary yet paired with hovering overseers. The consequences of the policy—haste, uncertainty and disparities in masking—brought a contrasting mosaic of wartime road maps. It's an historical oddity, and the odds are high it will never occur again.