A person standing on the banks overlooking this harbor and the massive facilities surrounding it would have been amazed at the sights and sounds. A vast fleet of ships stretched as far as the eye could see. The harbor's port facilities consisted of eight huge wharves with a city of warehouses and support buildings capable of unloading 25 ships daily. The thundering sounds and smoke of the trains, awaiting their cargo transfers straight from the ships or disappearing towards their destination, would have caused the observer to cover his ears and squint. This person would have stood in awe at the functioning of this tremendous operation and the 10,000 personnel who made it one of the busiest harbors in the word.

It was not one of the huge port facilities in World War II or Inchon Bay in 1950 or even Cam Ranh Bay during the Vietnam Conflict. This place was the Union advance supply depot at City Point, VA, situated deep in the heart of the Confederacy, only 20 miles from the Southern capital of Richmond. From the end of June 1864 to May 1865, City Point provided all supplies necessary to support the 125,000 men and 65,000 animals of General Ulysses S. Grant's Union Armies which lay siege to the strategically important town of Petersburg, VA. General Grant gave his highest praise to City Point and the Quartermaster personnel who ran this critical opera-
tion by stating: "There has been no army in the United States where the duties of Quartermaster have been so well performed." City Point, rarely mentioned in the numerous volumes on the Civil War, proved to be a vital factor which enabled General Grant and his Union armies to force General Robert E. Lee and his Confederate Army to surrender and end this brutal war between brothers.

Fully understanding and appreciating the importance of the supply depot at City Point requires grasping the events which led General Grant to order the creation of this modern port and the second largest city in Virginia during the time of its operation. President Abraham Lincoln and his advisors knew that to prevent the destruction of the country, the North must militarily force the seceding states back into the Union. Strategically, this mandated that the Federal forces take the offensive. From the beginning of the Civil War in 1861, the Union forces were numerically and logistically superior to the Confederate forces defending their capital of Richmond. However, this bloody and savage struggle raged into 1864 with little or no possibility of the war ending. The Southern commander, General Lee, and his Army of Northern Virginia had become legendary by continually defeating the Union forces and preventing the capture of Richmond, only 120 miles south of Washington. General Lee and his army inflicted major losses the Union armies and their commanders, such as at Fredericksburg in 1862 and Chancellorsville in 1863.

If the Confederate forces had suffered defeats of this magnitude, the war would have been over much earlier. After each campaign, the Union forces would quickly replace losses in men and equipment and appoint a new commander. The North's ability to sustain such losses stemmed directly from its vast and continually growing industrial base and its population that was three times larger than the Southern states. As the war progressed, the Union forces became stronger and better equipped with the latest in military weapons and technology. However, at the same time the South was becoming weaker and slowly bleeding to death. The Confederacy's ability to wage war diminished with each victory because of no significant industrial complex and a small population. Even from the beginning of the war, the South lacked the resources to take the general offensive which the North continually pressed against the South with little success. General Lee's invasion of the North in 1863, which was brutally repulsed at Gettysburg, PA, amounted to a raid with the intention of defeating the Union Army in the open away from the defenses at Washington.

In 1864, President Lincoln suffered under the weight of tremendous political pressure over the now long and costly war. He desperately sought an aggressive general who could wield the powerful Union Armies and finally force the South to succumb. Fortunately, the president looked to and appointed General Grant, the conqueror at Vicksburg to command the massive Union Armies. Grant knew that the South could not replace its losses and changed the strategic objective from taking Richmond, to destroying Lee's army. In May 1864, Grant started his campaign of attrition and marched south. Grant's forces would maintain the initiative and force constant combat upon Lee's shrinking army until its surrender in April 1865. Grant's method of warfare represented an entirely new concept for the Union. For the previous three years the Union Armies retreated northward after each defeat or at the coming of winter. As this campaign progressed southward through the spring and early summer, it resulted in the extremely brutal battles of the Wilderness and Cold Harbor, Virginia, with their unbelievably high casualties. By
June, Grant realized that Lee would not leave Richmond and its almost impregnable defenses. Grant recognized that a direct assault on Richmond would result in tremendous casualties and offered little opportunity for destroying Lee's army. Consequently, Grant marched his armies farther south with the intent to capture the city of Petersburg with its critical transportation networks. If Petersburg fell, Richmond would starve and thus force Lee's Army of Northern Virginia out into the open, where the vastly superior Union forces could destroy it. However, by the end of June, the Union forces failed to take Petersburg, and Grant ordered the siege of this small city.

Throughout history, the great battle captains, such as Alexander the Great and Napoleon, understood the importance of logistic support in winning a campaign. Grant fully grasped the significance of logistics and its impact on combat effectiveness. Throughout his numerous campaigns in the Civil War, the general planned for and built supply depots to ensure that his operational plans did not fail because of inadequate supply support. Conversely, the Union commander believed that his opponents would fail if he could sever their supply lines. As a direct result, on 18 June 1864, Grant ordered his Chief Quartermaster General, Brevet Major General Ingalls, to create a supply depot at City Point capable of supporting the forces participating in the siege of Petersburg. General Ingalls created a supply depot previously unparalleled in military history, a supply depot capable of supporting an army of 500,000 soldiers and supporting animals and equipment.

The supply depot at City Point supported the Union forces better than at any time during the war. City Point grew into an extremely efficient and diverse supply depot of over 280 buildings capable of providing all the support services necessary to keep a world-class army combat-effective. The port facilities consisted of eight wharves covering over eight acres with warehouses totaling over 100,000 square feet of the wharves. An intricate rail network of over 22 miles of track spanned from the wharves to directly behind the Union lines. During the campaign, the track grew together with the Union siege lines to transport over a half million tons of supplies directly to the combat units. City Point provided unequaled Class I (rations) support to the Union Army such as fresh meat and over 100,000 loaves of fresh bread daily. The massive repair shop located at City Point maintained the force of over 5,000 wagons and the 60,000 animals necessary to support Grant's army. During the siege of Petersburg, the first-class hospitals built at City Point became capable of treating 15,000 wounded with medical care unsurpassed in a field environment. For Grant to control the entire Union military machine, a highly efficient communication system was created at City Point that allowed Grant effective communication with not only Washington, but all of the Union forces throughout the country. To fully appreciate the importance and magnitude of this extremely complex and intriguing support center, a number of the major areas which made City Point function so smoothly will be described in detail.
Command and Control

The creation of City Point with its impressive support capabilities in less than 30 days represents an achievement second to none in prior military history. City Point was a credit to all who built it and made it run so effectively. However, a vast amount of the praise should be levied upon Brevet Major General Ingalls, the Chief Quartermaster of the Armies operating against Richmond. Ingalls' leadership provided constant guidance, support and a mixture of stringent control and autonomy for the different departments. The City Point depot was actually under the command of COL P. P. Pitkin until November 7, 1864, when he accepted the position as Quartermaster General of the state of Vermont Pitkin's successor, COL George W. Bradley, ably held the position of depot commander until the end of the war and the subsequent demilitarization and closing of City Point in the summer of 1865.

The depot commander controlled the overall operation and water traffic. The individual department chiefs had the operational freedom to manage their areas and personnel as necessary to meet mission requirements. However, Ingalls dictated that the depot commander submit a daily transaction report listing all of the receipts, issues and balances. The actual supply operation at City Point worked under the principles the "PULL" system. The Quartermaster Generals of both the Armies of the Potomac and James submitted on the 25th of each month a detailed list of requirements for the next month. Before this submission, these "realistic" supply requirements started at the regimental level, were passed to the next higher echelon using the Quartermaster channels and finally ended up on the desk of the army commanders for their signatures.

Ingalls' strict control greatly assisted in accountability and ensured proper prioritization of the supplies. Nothing left City Point without prior authorization from General Ingalls. As the siege became more permanent, the efficient management and operation of City Point matched with the improved rail and road network allowed the supplies to go directly from the depot to the brigade supply areas. In addition, the actual supply system response time for a request dropped to less than 24 hours and only a few hours in an emergency situation.

Wharves and Harbor

An intricate and amazing aspect of City Point was the operation of the harbor and wharves. Immediately, the small decrepit docks that existed at City Point started receiving sup-
plies, while the construction crews created the facilities that made City Point one of the busiest harbors in the world. By 1 August 1864, the wharves facilities and warehouses were complete and operational. At any one time, anywhere from 150 to 200 ships anchored off City Point awaiting their chance to unload cargo. Over 390 ships worked routinely between City Point and the other Union ports and supply centers. The facilities permitted cargo to be loaded straight from the ship to either railcars or wagons. The rail network which spanned all of the wharves was completed by 5 July. The 3,000 wharf workers consisted of mostly freed slaves. The number of ships that could be unloaded each day varied anywhere from 2 to 25 based on the size and type of cargo.

The wharves extended eastward along the southern banks of the James River for over half a mile. The wharves facilities covered over 350,000 square feet or 8 acres with almost 2 acres under cover. After the ammunition ship explosion on 9 August 1864, a special ammunition wharf was built a half mile down the James River in order to protect the rest of the harbor if such an occurrence happened in the future. The new ammunition wharf extended 500 feet into the James River with rail lines running to the end of the wharf to enhance unloading operations. The harbor docking area was segmented into specific wharves for the different commodities. The major departments, such as the Repair Shop, managed their own wharves in order for them to control all areas that may influence their operations and the flow of supplies to the soldiers.

The Rail System

The rail system represented one of the most impressive and important aspects of City Point. The rail system efficiently linked all areas of the depot at City Point with the battle front around Petersburg. As the Union railroads spread around the battlefield of Petersburg, it increased Grant’s combat effectiveness and chances of mission success; while at the same time, it had an adverse effect on General Lee’s ability to wage war. Lee’s troops were tied down protecting his railroads and their corresponding "life lines" to Richmond and the dying Confederacy. The rail lines greatly reduced the time required to get the supplies and soldiers to the front. Grant used these rail lines to quickly move vast numbers of troops around the battlefield. The 600,000 tons of supplies and equipment moved by the railroad reduced the number of wagons required by 50 percent or 5,000.

General McCallum, the commander of the United States Military Railroads, ensured that a strong construction crew, numbering 900 personnel under the command of MAJ E. E. Wentz, immediately started work at City Point after the order was given to create the depot. The railroad construction crews built the majority of the depot at City Point. The original plan for the depot at City Point called for temporary facilities and likewise were built in that manner. Consequently,
as the siege continued, the construction crews were forced to reinforce the wharves and buildings. By 2 July 1864, the construction crew finished rebuilding the 5 miles of track to Petersburg that existed before the war. A few days later, these industrious crews completed the track connecting the different areas of City Point depot. These first class railroad facilities included a large engine house and turntable. As the Union siege works grew southeast of Petersburg, the construction crews built the rail lines behind the Union lines. Eventually, the rail lines stretched 22 miles around Petersburg. Throughout the distance of the track, the crews built stations, sidings and platforms which increased the speed of distribution and reduced the amount of handling necessary to get the supplies in the hands of the front line soldiers. As many as 24 locomotives were used to transport troops and a daily average of 1,400 tons of supplies from City Point to the front lines. On the return trip, the trains carried the sick and wounded back to the hospitals located at City Point.

The Repair Shop

An extremely vital department at City Point was the complete repair depot created and commanded by Brevet LTC E. J. Strang. The repair depot performed the maintenance on the wagons, carriages and the other pieces of major equipment. Another important mission effectively managed by the repair depot centered around the receiving, recuperation and issuing of the horses and mules required by the Union armies in siege of Lee's Army of Northern Virginia. The repair depot work list numbered over 1,800 carpenters, wheelwrights, blacksmiths, saddlers, teamsters and corral hands. The repair shop operated its own wharf, due to the tremendous work load. The repair depot wharf covered 190 feet of waterfront and consisted of 26,000 square feet of storage space. The different shops of the repair depot were contained within six large buildings which covered almost 17,000 square feet of work space. LTC Strang's depot repaired 3,653 wagons and 2,414 ambulances. The depot shod 19,618 horses and 31,628 mules. This department issued 31,386 horses, 18,891 mules, 1,536 wagons and 370 ambulances. Strang even sent repair teams consisting of blacksmiths, carpenters and wheelwrights to different units at the front lines to shod and repair equipment.

Subsistence

Throughout military history, the topic most complained about by the soldiers was the food that they were issued and often ate only to survive. But the Union forces fighting around Petersburg received the finest food support that an army of that time period ever had in a field environment. The subsistence mission at City Point included feeding the approximately 65,000 horses and mules. To accomplish this important task of feeding the armies and supporting ani-
mals, it mandated extensive planning and communication between the Quartermaster Commissary personnel at City Point and the support personnel at the front. The Commissary Department at City Point was commanded by Captain Benedict.

The standard ration during the Civil War varied dramatically based upon a constantly changing menu, the food actually purchased and the food available at the front. For planning purposes, the standard ration, three meals per day, during the siege of Petersburg was roughly three pounds consisting of the different food groups. The standing operating procedure (SOP) required that 30 days of rations for personnel and 20 days of rations for the animals be on hand at City Point. Consequently, at any time at City Point 10,800,000 meals or over 16,000 tons of food could have been found in the large commissary storage facilities. The forage SOP mandated that the animals receive a daily ration of 26 pounds of food and based on the "on hand" requirement of 20 days this meant 33,800,000 pounds or nearly 17,000 tons of food was stored at City Point. In addition, the troops regularly received fresh meat in their rations. City Point maintained two weeks rations or 2,500 head of cattle within its compound and another herd about the same size across the James River. A major morale builder for the troops came in the shape of fresh bread. The bakery section produced over 100,000 loaves of bread daily. Often, the bread was loaded straight onto the trains and reached the troops while still hot.

Both the food (Commissary) and forage areas operated their own separate wharves and storage areas. The Commissary Wharf or Wharf #2 spanned 581 feet of waterfront and covered over 40,000 square feet. The Commissary department stored a vast portion of the rations in the nearly 27,000 square feet of storage space provided by the three warehouses located on the wharf. Wharf #4 or the Forage Wharf covered 630 feet of the waterfront and provided 71,000 square feet of storage space with nearly 17,000 feet of covered storage. The Commissary and Bakery section possessed another depot site located in the eastern section of City Point This compound consisted of 7 buildings covering 22,933 square feet of operating space.

**The Hospitals**

The medical care received by the wounded Union soldiers represented the finest in medical attention that that time period had to offer the sick or injured. Of the seven hospitals eventually located at City Point, the Depot Field Hospital was the largest and was able to provide care for
10,000 patients. Surgeon Edward B. Dalton commanded this tremendous operation of 1,200 tents, which blanketed 200 acres. As the weather cooled, 90 log buildings, 20 feet by 50 feet were built to house the wounded, but operations still required that 324 tents remain in use throughout the winter. Nurses ensured that each patient, who had his own bed and washbasin, was clean and comfortable by regularly providing clean linens and clothes.

These hospitals represented self-contained cities. They operated their own supply system very similar to the modern day network. The hospitals requisitioned, received and stored their own supplies. This system functioned so smoothly that the soldiers never lacked the necessary medicine or equipment. The hospitals ran their own laundries, dining facilities and dispensaries. These medical facilities even had running water, pumped from the James River, to assist in keeping the hospital as sanitary as possible under field conditions. These hospitals received vast amounts of assistance from civilian agencies such as the Christian Commission and the U.S. Sanitary Commission. These agencies provided fresh and canned fruit to help lift the health and morale of the soldiers. Each Corps had their own Sanitary Relief Station consisting of two wagons. These relief stations issued 100 tons of canned tomatoes, 1,200 barrels of cucumbers and 17,000 cans of Sauerkraut. The soldiers at City Point even had a lemonade stand to quench their thirst. Usually, two or three ships, loaded with goods supplied by these civilian commissions, sat at City Point waiting to unload their "treats."

Conclusion

On June 18, 1864, Grant ordered the first of the many huge forward supply depots that the United States would build in the next 125 years in order to wage war on foreign soil. The U.S. is building modern depots, similar in mission to City Point, to support the American forces in Saudi Arabia. The facilities built at City Point surpassed all such compounds built previously in military history. This depot allowed Grant to maintain the initiative and continue his offensive operations around Petersburg which enabled him to achieve his objective of forcing Lee's Army of Northern Virginia out of its defensive positions. The facilities gave Grant the ability to mass his forces, move quickly and strike hard. The Union's combat effectiveness actually increased during the siege because of the support provided by City Point. The Southern forces during this same period slowly starved to death. The success of City Point stemmed directly from the leadership, professional ability and hard work of the 10,000 personnel, especially the Quartermasters, who created and ran this critical factor in Grant's victory.