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**Testimony of
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**Before the
House Committee on Transportation and Infrastructure
U.S. Coast Guard Budget and Oversight Hearing
April 18, 2007**

My name is James M. Atkinson, and I am the President and Senior Engineer of Granite Island Group located in Gloucester, MA, which is a small veteran owned company that since 1987 has specialized in the field of electronics engineering. We have special capability involving the protection of classified, confidential, privileged, or private information against technical attack, eavesdropping, or exploitation.

I am responsible for performing visual and instrumented TSCM (Technical Surveillance Counter Measure) surveys. This includes the analysis of all signals present on the airways; evaluation of telephone lines, computer networks, detection of computer viruses and Trojan horses, security of voice and data switching systems, and any mechanism by which a spy could commit technical eavesdropping or surveillance against or exploitation of a target through technical means. Also included in these responsibilities are the studies of electromagnetic interference (EMI), and the study of electromagnetic compliance (EMC), to include the performance of visual and instrumented TEMPEST inspections, and measures to mitigate other technical weaknesses in communications and computer systems.

I have attended extensive private and government sponsored TSCM, TEMPEST, cryptographic, technical intelligence, electronics, and security training both in the United States and abroad. I have been involved in many hundreds of TSCM, TEMPEST inspections, over the past 25 years of government and private sector assignments. I have been extensively published on these subject matters, and have authored materials that have affected national policy.

My clients include major corporations, heads-of-state, diplomats, government agencies, defense contractors, hospitals, courthouses, police stations, banks, universities, publicly traded companies, private companies, stockbrokers, ranchers, farmers, fisherman,

accountants, law firms, restaurants, political leaders, ministers, small businesses, and private individuals.

I believe that I am in the unique position to act as an independent and disinterested party, “honest broker”, (and Voice of Reason in these proceedings). I was not involved in the ICGS Deepwater program in any regard or capacity and have no ax-to-grind. I am also able clearly explain highly technical and highly classified subject matters such as TEMPEST and TSCM to this committee in an unclassified way that a non-technical layman can understand. The documents in this matter are highly technical, and it takes a TEMPEST and TSCM expert to fully understand what is in those documents, what they represent, what they mean, and more importantly to bring forth the gravity of the situation.

I have also carefully analyzed hundreds of pages of documents and reports which were provided to the government by ICGS (the Deepwater contractor) when the first eight 123 foot cutters were delivered to the Coast Guard. These documents were not classified in any way, and were available to any member of the public by merely asking the Coast Guard for them. Within these documents, I discovered that ICGS delivered seriously defective ships to the government, which did not comply with TEMPEST standards, which the government could not use for classified missions, and which could not be used to store, process, or transmit classified information.

All of the information contained within this written testimony, and all information, which is presented in my oral testimony, is completely unclassified.

TEMPEST Introduction

When a new consumer electronic device such as a computer, DVD player, blender, electric razor or other modern electronic marvel is offered for sale to the public the manufacture has to gain a special certification or authorization from the FCC. This process ensures that when the consumer uses the device that they will not interfere with other devices in the area. For example, we do not want a DVD player or blender to accidentally jam all the TV, and cellular telephones in a five-block area due to a poor product design.

The FCC (Federal Communications Commission) and its foreign equivalent have created a series of formal standards which new equipment is evaluated against before it is offered for sale to the public.

These new products are taken into a specialized laboratory, and an engineer completes a complicated battery of tests. These test results are then sent to the FCC who then approves or denies permission for the product to be sold to the public.

When modern electrical devices operate, they generate electromagnetic fields. Digital computers, radio equipment, typewriters, and so on generate massive amounts of electromagnetic signals, which if properly intercepted and processed will allow certain

amounts of information to be reconstructed based on these "compromising emanations". Anything with a microchip, diode, or transistor, gives off these fields.

Compromising emanations are these unintentional intelligence-bearing signals, which, if intercepted and analyzed, potentially disclose the national security information, transmitted, received, handled, or otherwise processed by any information-processing equipment.

These compromising emanation signals can also escape out of a controlled area through power line conduction. Other conduction paths can be air conditioning ductwork, plumbing, wiring, or by simply radiating a signal into the air (much like a radio station). These signals can also mix with or be impressed onto other unclassified signals, where the eavesdropper merely intercepts these unclassified signals, and extracts the classified information riding on top of the unclassified signal.

An excellent example of these compromising emanations may be found in several modems and fax machines. When these modems operate, they generate a very strong electromagnetic field, which may be intercepted, demodulated, and monitored with nothing more than a radio that any member of the public can purchase at Radio Shack, Best Buy, Wal-Mart, or other retailer of consumer electronics (which, in some cases, may, or may not be legal). This is also a very serious problem with many speakerphone systems used in executive conference rooms and government offices. A considerable problem also exists with many fax machines, computer monitors, external disc drives, CD-R drives, scanners, printers, and other high bandwidth or high speed peripherals and network devices. If an eavesdropper is using high quality, intercept equipment the signal may be easily acquired several hundred feet or more away from the target, although the eavesdropper would normally be located quite close to the system under surveillance.

In the consumer markets, a slight amount of signal leakage really does not present a problem and at most would result in a breach of private information or disclosure of some corporate secrets. However, if a computer or other communications equipment that was processing classified information has a leak, the results could be devastating. Soldiers can be killed, wars can be lost, and nations can fall.

During the early days of telephones, there was a significant problem where a person talking on one telephone line could clearly hear a person talking on another telephone line. This was most often the results of shoddy workmanship on the part of the phone installer, but also a result of using poor quality wiring in the early phone systems, and having inferior, albeit newly developed equipment. This problem is called "cross-talk", where one conversation leaks into a nearby phone line and can be heard by a third party to the original conversation between the original two parties. While this problem can be drastically limited in modern phone systems it has by no means been eradicated completely, and continues to be a problem most often caused by poor quality workmanship.

World War One brought about a method where soldiers on one side of a battlefield were able to eavesdrop on their enemies telephone calls. This allowed them exploit this

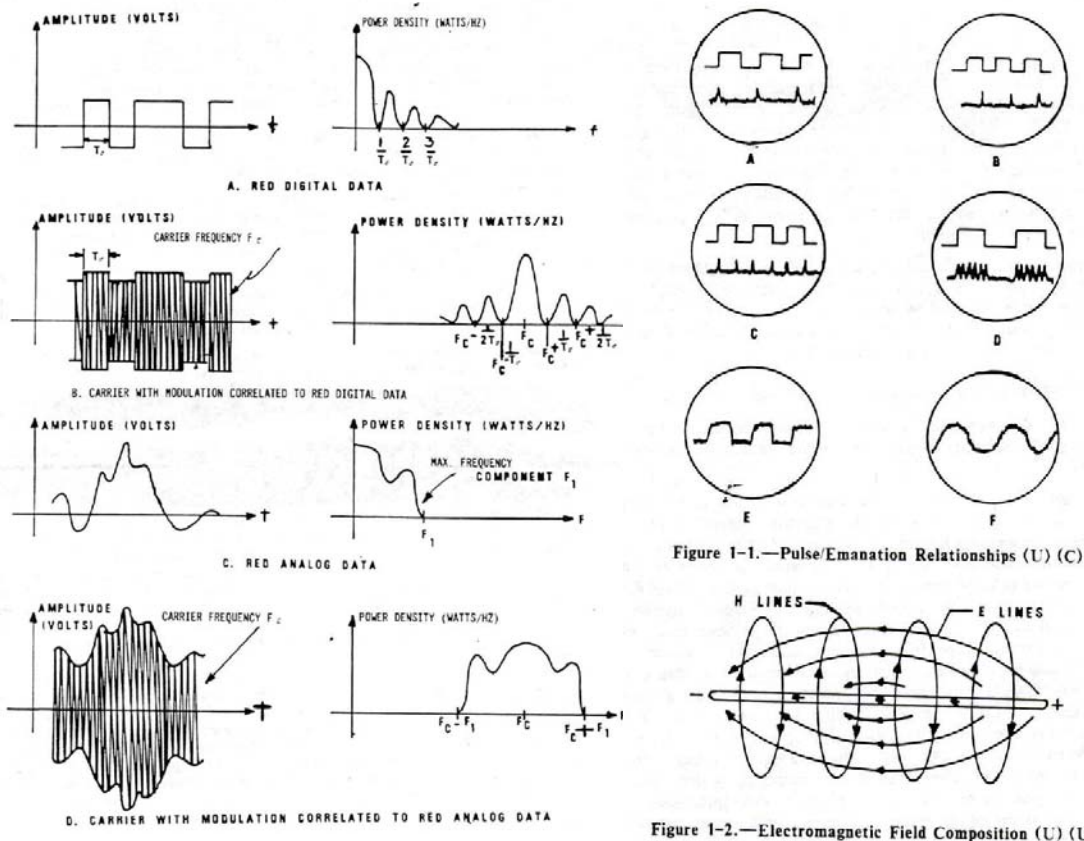
information to determine troop movements, and to gain a significant tactical advantage on the battlefield.

During World War II, both sides of the conflict exploited signals, which leaked out of each other aircraft, surface vessels, and submarines. The Germans were able to detect, and shoot down U.S. bombers when their radio and navigation systems were merely turned on, but not actually transmitting. Submarines were similarly hunted by listening for this accidental leakage, and to this day the study and exploitation of this type of accidental signal leakage has become a staple of the intelligence and military community.

In the 1950's NATO eavesdroppers in Germany discovered that classified information could be derived by monitoring unclassified teletype circuits. The cause of this was found to be that the classified and unclassified wiring was running too close to each other and causing classified information to bleed onto the unclassified wiring. What this investigation by intelligence analysts discovered was that by monitoring local high power radio stations that fragments of classified information could be extracted from the unclassified broadcast stations from a considerable distance from the location where the classified information was being processed. Continued investigation led to a sub-specialty in the field of electronics engineering that permitted one side to monitor the classified efforts of the other side by merely exploiting unclassified communications that were passing through the classified area. In other words unclassified signals opened the door to the acquiring of classified information.

To deal with this "signal leakage" issue the U.S. government developed a series of formal, and extremely rigid engineering standards which lay out how equipment should be designed, installed, and maintained to avoid such leakage. These TEMPEST standards are really nothing more than several standard civilian engineering measurement standards and procedures enhanced by the NSA to make them more rigid and comprehensive than their civilian counterpart.

TEMPEST is an acronym for "Telecommunications Electronics Material Protected from Emanating Spurious Transmissions" and includes technical security countermeasures; standards, and instrumentation, which prevent (or minimize) the exploitation of security vulnerabilities by technical means. Other popular names for TEMPEST are "Transient Emanations Protected from Emanating Spurious Transmissions", "Transient Electromagnetic Pulse Emanation Standard", "Telecommunications Emission Security Standards", and several similar variations.



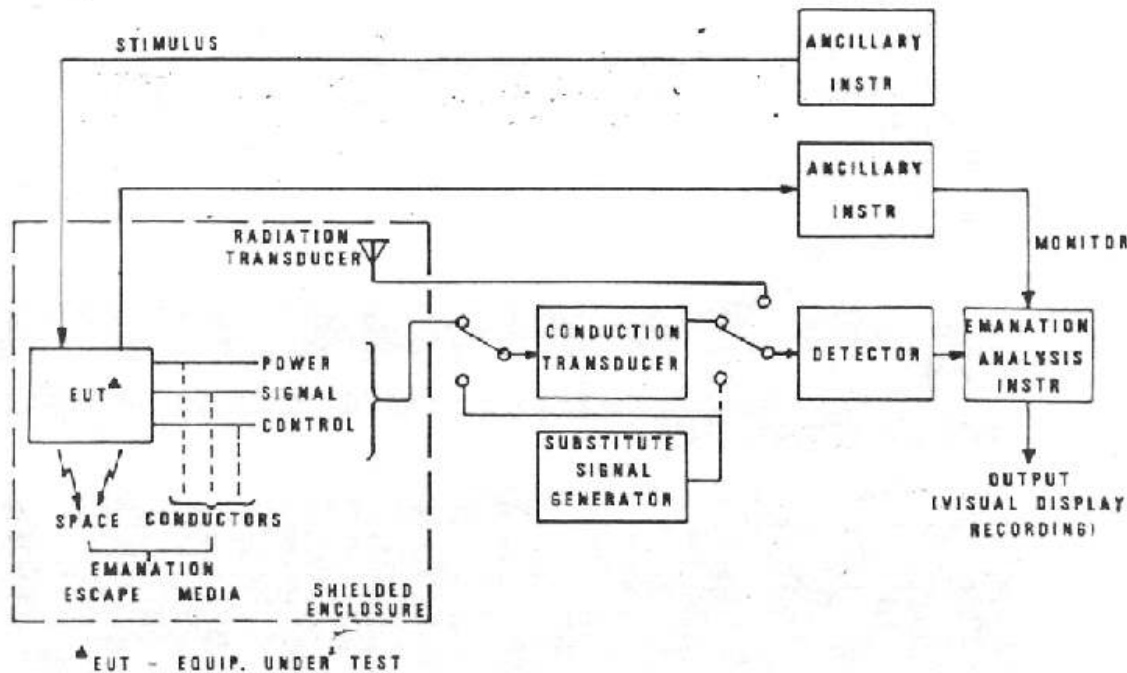
In 1957, the U.S. Government mandated rigid TEMPEST required for highly classified systems that were responsible for handling the most classified secrets of the Cold War and helped to contain our secrets for the next 20 years until details of those systems were sold to the Russians by multiple spies in trusted positions in the U.S. government.

TEMPEST is nothing more than a fancy name for protecting against technical surveillance or eavesdropping of UNMODIFIED equipment, (the unmodified part is important.) TEMPEST and its associated disciplines involve designing circuits to minimize the amount of "compromising emanations" and to apply appropriate shielding, grounding, and bonding. These disciplines also include methods of radiation screening, alarms, isolation circuits/devices, filters, isolation distances, and similar areas of equipment engineering.

A certified TEMPEST technical authority (CTTA) is an experienced, technically qualified U.S. Government employee (not a contractor) who has met established certification requirements in accordance with NSA approved criteria and has been appointed to fulfill CTTA responsibilities.

There is an isolation area just outside of a classified system where it is less practical to exploit TEMPEST vulnerabilities. However, other systems present inside or near this isolation, area can considerably extend this distance to well outside the isolation area. This is often referred to the "zone of control", or "zone of exclusion".

The Equipment Radiation TEMPEST Zone (ERTZ) is a radius established because of determined or known equipment radiation TEMPEST characteristics. The zone includes all space within which a successful hostile intercept of compromising emanations is considered possible. This zone can range from a few yards, to several miles depending on the nature of the classified information on the equipment on which it is being processed.



As a spy moves away from a location where classified information is being processed the exploitation of accidental leakages becomes increasingly difficult. There is a specific classified voltage level called the “Compromising Emanation Performance Requirement (CEPR). This is the maximum emanation level permitted at the standard measurement distance during an instrumented TEMPEST evaluation. When the CEPR is met, there will be minimal chance that a compromising emanation will be detected beyond the specified design radius unless the equipment has not been properly maintained, or if a secondary signal provides a carrier for the classified signal.

The point where the compromising emanation performance requirement (CEPR) applies. For an electric or magnetic field emanation, the standard measurement point is one meter from the equipment under test. For a conducted emanation, the standard measurement point is the design radius. This is called the “Standard Measurement Point,” and it represents a distance similar to that found in civilian EMI and EMC studies.

The goal of the CEPR and ERTZ is to ensure that the signals emitting from an item of classified equipment is below -164 dBm at a distance of 1 meter, and ideally below -174 dBm (although signals below -150 dBm are tricky to measure during a one week TEMPEST inspection). The TEMPEST standards are thus based on reducing signals

below these levels, often involving keeping a cable more than a meter away from another cable, or keeping high threat device 3 meters away from others.

The delicate point is that the CEPR and ERTZ can also foster a great sense of false security and a TEMPEST Zone can completely pass a visual and instrumented TEMPEST evaluation and yet still be highly exploited by spies for classified signals and information.

A “TEMPEST zone” is a formally designated area within a facility where equipment with appropriate TEMPEST characteristics may be operated. Once the classified equipment is installed into this area is meticulously checked by a CTTA with a formal instrumented and visual TEMPEST inspection. This zone is commonly called a “Black Vault”, or “Black Room” where classified equipment is located even though the zone will contain RED signals, RED equipment, and RED lines (“RED” means the equipment in the “Black Vault” is classified. This is a common point of confusion, and as such, a “black room” should be considered the same as a TEMPEST zone. The isolation zone is the area immediately surrounding the “TEMPEST Zone” of Black Vault.

Focus of Study, and Objectives

TEMPEST disciplines typically involve eliminating or reducing the waveform of signal transients caused by a communication signal and the resulting harmonics or mixing of the classified information with unclassified signals. These signals and their harmonics could allow the original classified signal or information to be reconstructed and analyzed by a spy.

TSCM or Technical Surveillance Countermeasures on the other hand deals with protecting against hostile penetrations or manipulations by an eavesdropper to facilitate the interception and exploitation of classified, confidential, privileged, or private information. It is important to note that TSCM deals with things that have been manipulated in some way, and TEMPEST deals with unmodified things.

The mind-set, hypothesis, or base-line of a TEMPEST inspector is that nothing is there until you can prove otherwise. Their job is to stop or limit compromising emanations and the technical leaks of classified information that are the results of poor equipment design, installation, or maintenance. A TSCM inspector on the other hand always assumes that an eavesdropper is active or that a bugging device or hostile manipulation is present until they can scientifically prove otherwise. TEMPEST assumes a proactive position on protecting classified information, whereas TSCM involve the reactive protection of the same information. Both disciplines are equally important and should be engaged in a proactive manner.

C4ISR is the fusions of “Command, Control, Communications, Computers, Intelligence, Surveillance and Reconnaissance” into a single operative system to permit a more cohesive flow of critical information in a battlefield or tactical arena. The critical components of this are the core “Command and Control” elements. In a modern battlefield, the commanders need as much information available to them, on as rapid as

possible timeline. With this in mind C4ISR draws together most of the resources on a battleship, command post, or forward control station directly into the hands of the people who need it most.

C4ISR system included the missions of gathering, processing, and transmitting information, the Command, Control, Communications, Computer, Intelligence, Surveillance, and Reconnaissance (C4ISR) facility contains as a minimum ten distinguishable elements. These are the structure or housing; electrical power generation and distribution [both alternating current (ac) and direct current (dc)]; non-electrical utilities; heating, ventilation, and air-conditioning (HVAC); an earth electrode; lightning protection; communications systems; computer and data processing systems; control and security systems; and personnel support systems.

TEMPEST in a TEAPOT and HIJACK Exploits

Between the TEMPEST and TSCM fields of study there is also an area of our field that deals with unmodified or quasi-modified equipment and signals, which interact with each other. This is the case where in effect a classified signal or classified information is accidentally impressed onto an unclassified signal. Thus, the unclassified signal carrying the classified data with it is accidentally transmitted a considerable distance allowing for eavesdropping by those who should not possess the information. This is usually the result of TEMPEST standards not being rigorously followed during equipment design, installation, and maintenance.

The investigation, study, and control of intentional compromising emanations from telecommunications and automated information systems equipment that was created, provoked, or induced by a spy is known by the code name of “TEAPOT”. An example of this would be the positioning of a rack of two way radios near a secure telephone, or by installing RED cable near to a BLACK cable. This can also involve modifications to software, to slight breaches to the configuration of equipment.

An example of this would be a case where a cable, which contains only unclassified radar, navigation, or communications signals, is placed near a cable, which carries highly classified information. On a maritime vessel an example of an unclassified signal would be the VHF marine radios, the unencrypted HF (shortwave) radio communication systems, and sections of the radar and IFF systems. Should any of these cables or equipment be placed near the classified systems an eavesdropper could intercept the classified information that was riding-on-the-back-of the unclassified signals.

Another example of this would be a warship that downloads classified spy satellite imagery through the onboard satellite communication system. The problem is that the installer of the classified system has not properly installed the system that creates considerable TEMPEST problems causing these signals to leak off the ship a short distance. This is further complicated by several cables which do not carry classified information but which pass in close proximity to the classified cables. Due to the unclassified cable, perhaps being a high power antenna link the classified information can

now leak out of the ship and be monitored by spies from dozens, if not hundreds of miles distant.

Instrumented TEMPEST Inspections

If the instrumented inspection turns up a problem that was major or serious then they absolutely would have had to have performed the entire instrumented inspection again; however, if they were only very minor problem turned up in the instrumented inspection the inspector could have merely pointed out several minor faults and left it up to a third party to resolve the issue.

If the equipment configuration was materially changed to correct visual TEMPEST discrepancies, or equipment or cables were moved in the area that was inspected then the instrumented TEMPEST inspection would have had to be repeated again and again until all discrepancies had been fully cleared.

Given the magnitude of the problems found during the visual TEMPEST inspections there would have been material changes in the secure areas, cables would have to have been re-routed, and physical and electrical changes would have been made. In turn, yet another, expensive follow-up instrumented test would be needed.

This is why is it so critical for all visual discrepancies to be fully resolved before the instrumented TEMPEST inspection is initiated as the correction of visual deviancies may render the prior instrumented inspection of little or no value.

It is a painful issue because with this number of visual faults it is unlikely that the ship could have passed the instrumented TEMPEST inspection. The magnitude and number of the problems with the TEMPEST on this ship are such that the instrumented inspection SHOULD have been re-performed from scratch. The Coast Guard had to relocate quite a bit of equipment, and re-run quite a bit of cables and systems to resolve the massive faults listed in the DD250 (attachment C), these changes would have create a number of significant and material changes from what an instrumented TEMPEST inspection before and after the changes would have seen.

If the initial instrumented TEMPEST inspection identified only the instrument panel and LAN intersection weaknesses then there is an even bigger problem because it should have also picked up on the faulty ground straps on the racks, the emissions from the ARC-210 wiring, the signal leakage from the unshielded cables, and so on. If you find significant problems on a visual inspection, you should also pickup on similar problems in the instrumented measurements as well.

It is best compared to your checkbook where one column is your credits, and one column is your debits. If you have a loose grounding cable, it should show up in the visual inspections, and then once you begin the instrumented inspection you should see the same effects of the ground cable not being hooked up properly. On the other hand, if the visual inspector was finding problems at the same time the instrumented inspector was

performing the instrumented inspections the two events could have been interfering with each other and resulting in inconsistent results.

In the records of the first four ships there is mention of an instrumented TEMPEST inspection being performed, and in all four cases both the instrumented and visual inspections failed.

In the two OIG reports, I was unable to find any reference to the PADRE being subjected to a second instrumented TEMPEST inspection as the Coast Guard has contended in other documents. If the PADRE was in fact re-inspected, who did the inspection, and did they have any links to ICGS, LM, GD, USCG, SPAWAR, DHS (the bigger question is that did the agency or contractor who performed the second instrumented inspection on the PADRE have any bias, or benefit to the PADRE passing)?

The Coast Guard appears have issued waivers too many of the TEMPEST requirements, gained IATO, keyed the C4ISR systems, and then granted ATO. This causes a problem though, because if they were granting large numbers of waivers for TEMPEST the waivers would be a matter of record on the second PADRE inspection. A USCG TEMPEST inspector is going to honor the waivers, but any other independent TEMPEST inspector is going to instead write up the systems as not being in compliance with a range of NSA TEMPEST standards and documents.

The NSA requires that the equipment meet TEMPEST standards of performance before it is allowed to pass classified information. If the system passes an instrumented or visual inspection, and the ship or equipment is modified in a material way then the instrumented test should be performed from scratch. In order to correct, the things found in the visual inspection there would have been material changes made to the ship.

The method that the OIG report tries to describe during the TEMPEST inspection is called a "propagation study" or "walk away study" and is performed when an instrumented inspector is unskilled and cannot obtain a solid reading with his instruments. He will tune a receiver to a signal of interest and slowly back away from an area he is examining until the reading drops below a preset level. This is performed in all directions around the area being protected, but is often the best test a technician can perform if they are limited in equipment, experience, or time on target.

It is in extremely bad form to do this, but often it is the only way to evaluate how "dangerous" a TEMPEST problem is. The concern that we run in to with merely performing a "propagation study" is that it fosters bad engineering practices, and can conceal much more serious issues that could be exploited by a spy.

An unclassified example of a similar situation would be a USB cable between a computer and printer that is leaking a signal that the TEMPEST inspector measures to be quite strong 20 feet away from the cable. The NSA specifications will mandate that this signal is not a problem so long as the voltage level drop below a certain level (we will arbitrarily say -130 dBm to set an unclassified level), beyond a certain distance (we will arbitrarily say 70 feet to set an unclassified level). So if the signal measures say -35 dBm at 20 feet

away, but only -130 dBm at 70 feet away we say that the signal has been attenuated by 95 dB over a distance of 50 feet.

If the inspector detects the signal radiating from the USB cable, instead of performing actual measurements to document the technical parameters of the fault, the inspector will “back away” with his test instruments to see if his equipment can still pick up the signal when he is X feet way from the cable or equipment be tested.

It is actually better to get as close as physically possible to something that you are trying to certify, and to be mere inches away at the most. This depends on the signal or piece of equipment that you are trying to measure, but as a rule you place the test instrument antennas as close as physically possible, and run a test cable back a few yards so that the TEMPEST or TSCM inspector does not pickup the signals from the equipment he is using to make the measurements (or even his own wrist watch).

Without disclosing any classified information I can relate to you that classified (or RED) equipment should not present a voltage level greater then -174 dBm at a distance beyond 3 meters. Further, there should never be any signal that exceeds -50 dBm within 3 meters of any classified system, but the general rule is to keep this -50 dBm number actually closer to -135 or even -160 dBm (which is only possible with modern test equipment, including modern TEMPEST instruments).

It must be further pointed out that skilled engineer (or spy) equipped with the proper equipment, and given the appropriate amount of time can actually find and exploit signals that are far weaker than this.

Within TSCM, TEMPEST, TEAPOT, HIJACK, NONSTOP, JERICHO, and related disciplines of electronics engineering we endeavor to correlate signals into our test equipment. More specifically, we will synchronize our test equipment to the timing signals created inside the equipment we are testing. We will then use this correlated signal to “gate” our test equipment into initiating a measurement when a certain signal threshold is detected, observed, or expected or we will gate the equipment to a specific time or other event.

An example of this “gating effect” or correlation would take place in a radio, which uses Frequency Hopping or Direct Sequence modulation techniques or waveforms. If we know the technical parameters of these waveforms in advance, we can program our TEMPEST test equipment to only perform the measurement of the equipment under test when the Frequency Hopping signal is following a certain hopping sequence or pattern.

Another example of this gating effect would be the timing signals used on a RADAR system or on an IFF system where the signals appear at fixed or highly predictable time periods. By only taking the measurement with the TSCM or TEMPEST instruments during these “moments of opportunity” the effectiveness can be increased by several thousand times.

Related to this, if the spy can also determine the timing or other parameter of an operations system (such as RADAR, IFF, SATCOM, INMARSAT, VHF, UHF, etc) the

spy can also exploit this gating effect to enhance his effectiveness by several thousand fold as well.

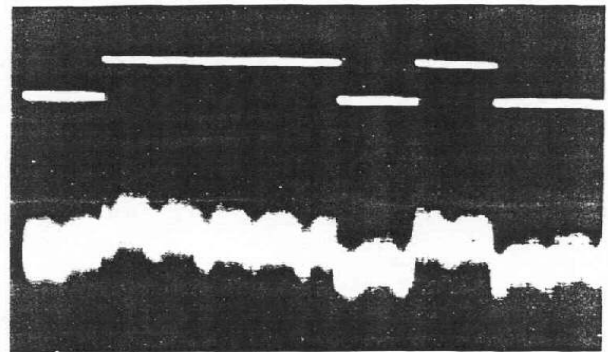
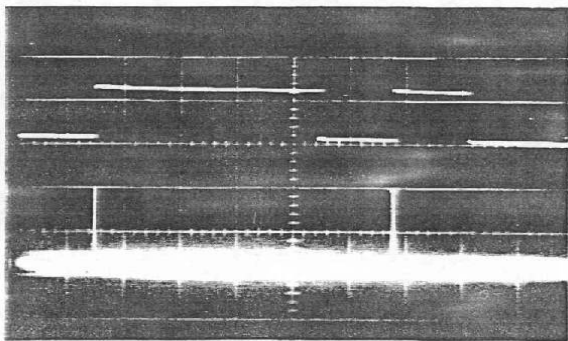
If a hot, BLACK (unclassified) signal is exposed to a weaker RED (classified) signal the two signals will mix and the BLACK (unclassified) signal will now carry parts of the RED (classified) signal. In the case of the Bluewater cutter 500-watt IFF transponder, very high power RADAR systems, and the strong two-way radio systems on the ship, even the slightest leakage in the RED (classified) equipment will cause mixing with the black equipment signals and thus a hemorrhage of classified information.

A typical piece of (unclassified) equipment that would be used for this measurement would be the DSI-1550-A (http://www.dynamicsciences.com/client/show_product/33) and the DSI-9000A, DS-200, DSI-110, R-1580, R-1250, R-1180, and related equipment made by the same company. Other companies such as Electro-Metrics offer products such as the EM-2100 series, and with Watkins-Johnson, we have the venerable WJ-8999 Portable EMC/TEMPEST Test Receivers or WJ-9195 systems, and with other companies, we have a host of similar products of an unclassified nature.

This equipment is highly specialized test instruments that are designed to measure extremely weak signals levels and which can measure a low level signals that is barely measurable by other means. This is one of the many pieces of equipment the instrumented TEMPEST folks would have used, and they would have used a wide range of related equipment resulting in several thousand pounds of equipment being brought to bear against the ship for these measurements.

The DSI110 for example is capable of making measurements down to -164 dBm, and by using signal simulators and converters; the range can be greatly increased to well within, and below the Johnson noise floor of -174 dBm. The test equipment can also be triggered via a direct connection from the equipment under test to "gate" the measurement, which further enhances the sensitivity. This would be combined with high performance cables, ultra-sensitive low noise amplifiers, oscilloscopes, computers, cables, dozens of antennas or probes, and many hundreds, if not thousands of pounds of support equipment.

Examples of Captured "Compromising Information" of Leakage



Example Test Lay Out

MIL-STD-461E

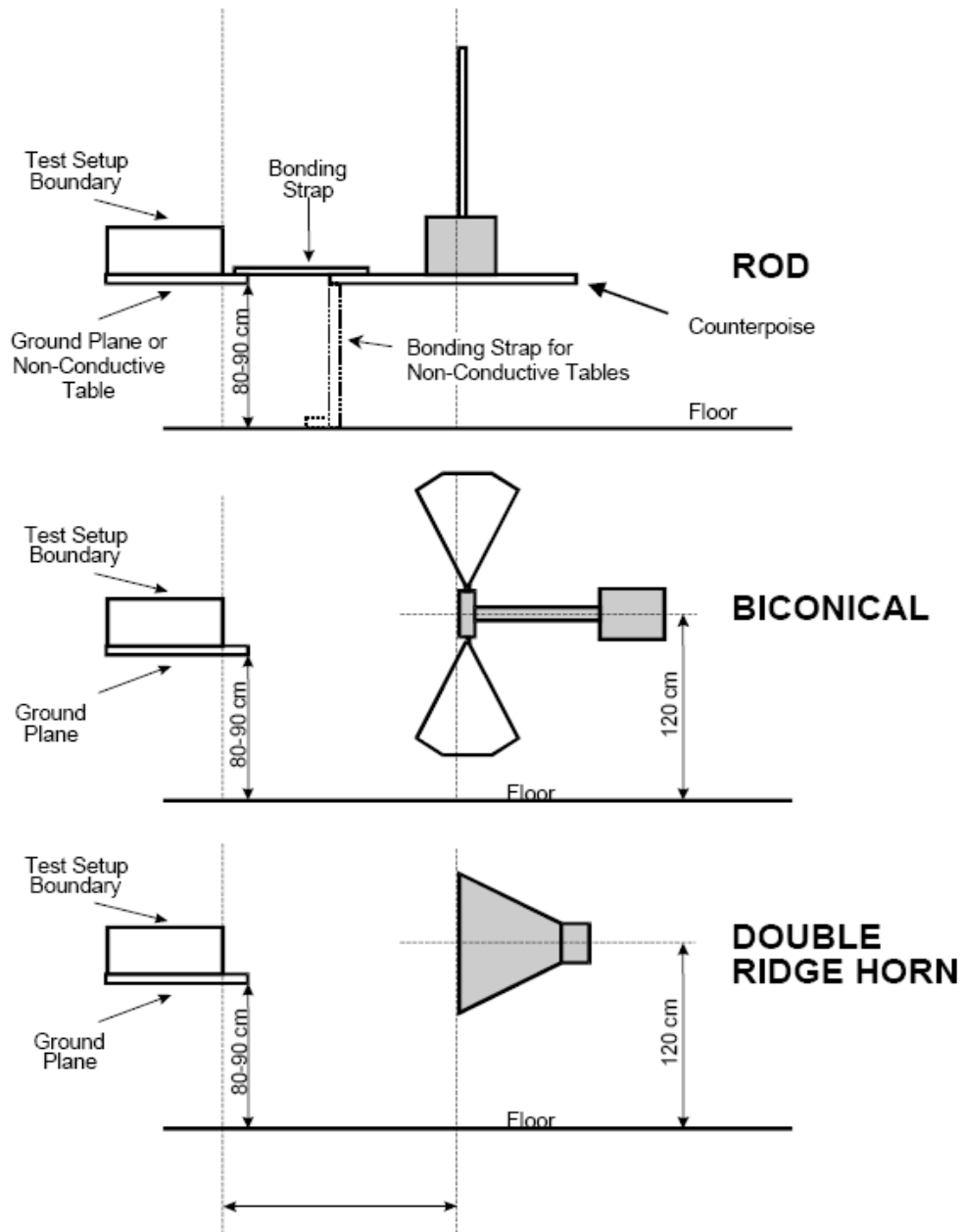


FIGURE RE102-6. Antenna positioning.

The vast majority of this equipment can be openly purchased on the market, and surprisingly the U.S. Government often sells this same equipment off on a regular basis as scrap or surplus.

There is no reason for the Coast Guard not to have had this equipment on hand to perform their own instrumented TEMPEST inspections, and further no reason for ICGS and/or Lockheed-Martin to have had this equipment on hand to perform at least some measure of instrumented inspections prior to the SPAWAR instrumented inspections.

Red and Black Isolation

A BLACK line, BLACK signal, or BLACK system is one in which no classified information is present, and onto which no classified information can leak or can be manipulated to cause the leakage of classified information. If a signal of message is intercepted off of a black system or line, it will not divulge any classified national security information if recovered and analyzed by a spy.

RED lines, RED signals, RED components, RED modules, and RED systems are those, which handle highly classified national security information. Should any weakness or flaws of any type in a RED system take place the results could be devastating to the national defense as classified information could be leaked to spies.

RED/BLACK isolation is part of the concept that electrical and electronic circuits, components, equipment, and systems. Thus, RED signals which national security information or unencrypted language, and unclassified information in electric signal form (RED) be separated from those, which handle encrypted or non-national security information (BLACK). Under this concept, RED or BLACK terminology is used to clarify specific criteria relating to, and to differentiate between such circuits, components, equipments, systems, etc., and the areas in which they are contained.

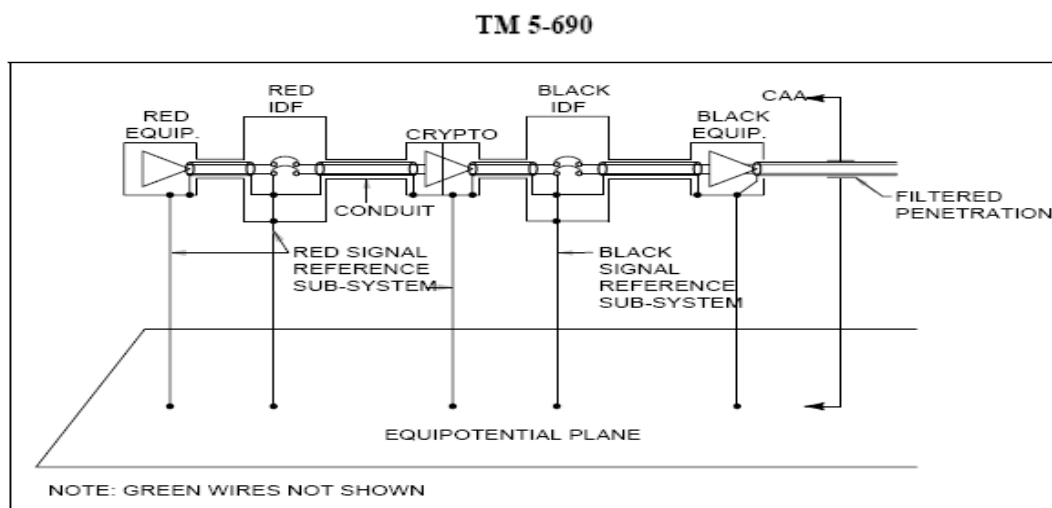


Figure 2-5. Recommended TEMPEST signal reference subsystem

Perpetual Vigilance

TEMPEST and TSCM both require extreme attention to detail, and aggressive, perpetual vigilance. The slightest flaw in classified equipment design, installation, or maintenance can be, and frequently have been exploited by foreign intelligence agency. Spies aggressively seek out the technical weaknesses in our ciphering systems, our classified information systems, our computers, and our intelligence systems.

When one of our government agencies is asleep at the wheel, only bad things can happen. When inspection reports are falsified bad things can happen. When government agencies start passing responsibility to other parts of the government and not owning up to their own inter-agency responsibilities only bad things can happen. When the leadership of a government agency ignores their responsibilities to glad-hand the agencies contractors only bad things will result. When there is malfeasance in the leadership of a military or civilian agency and the government contractors take advantage of that malfeasance to gouge the government and provide them with flawed goods and serves then only bad things can happen.

The men and women of the Coast Guard have a difficult and critical job to perform on behalf of the public. They save lives, they defend our maritime ports, and they perform drug interdictions, ensure safe maritime transport, and are responsible for the security of our port and waterways. The Coast Guard needs solid and stable ships so that they can engage in a wide range of mission to defend this country and ensure the safety of the public. When the safety and lives of service members of the Coast Guard is at risk, so is the safety and lives of every member of the public.

Several of the missions of the Coast Guard requires that it has immediate access to classified information via a classified network called SIPRNET, but access to this classified network and the information must be tempered with great control and oversight. To maintain this control and oversight a series of standards have been developed which first address the actual hardware through which this network communicates, and then a second set of standards that dictates a standard of performance for the software, which operates on the hardware. TEMPEST standards that apply to the hardware part of the equation rigorously dictate the performance characteristic of all equipment used to engage in classified communications, which includes all Coast Guard assets with access to classified systems.

The Coast Guard must be perpetual vigilant not only in regards to search and rescue missions, but also must be equally aggressive with protecting classified information, classified networks, and classified communications systems.

Much the same way that a minor error during a Coast Guard search and rescue mission can lead to the death of someone they have been sent out to rescue, a seemingly insignificant installation error, or lack of aggressive oversight of TEMPEST on a Coast Guard asset can be far more devastating and can cause suffering and death on a national level. It can also be something as simple as a cable not being properly routed, or a lock

washer not being of the correct type, and mounting bolts not being torque down properly, or threads on a bolt not being cleaned.

Our foreign adversaries want to steal our secrets, and they have considerable resources to facilitate such thefts. Foreign countries are actively spying on us, and aggressively trying to steal our secrets. The only defense against this constant threat is perpetual vigilance, and aggressive, and pro-active protection of classified systems. This nation will not survive, nor will it endure unless we can protect these systems.

DD250 and Acceptance Documents

A DD250 form is a standardized “Material Inspection and Receiving Report” that a contractor fills out prior to developing an asset to the government. On this document, the contractor lists the prices that the government will pay for the asset, and will list incidental charges that they may have incurred such as charges for special testing, special supplies on so on.

Once an authorized representative (or a group of representatives) has inspected the asset, the document is signed on behalf of the government, the asset is formally accepted, and the contractor can be paid for the asset, which they are selling the government, or for the work, which they performed on the governments’ behalf.

It is customary for the DD250, or a document attached to the DD250 to include a list of all of the flaws that may have been discovered during the government inspections, or systems that may not have been fully functional or installed on the date that the asset was delivered to the government. This allows the government to withhold a reasonable amount of the money that is due the contractor until after the problem is resolved or the missing equipment installed.

Attached to the DD250 will usually be some type of formal document or “Certificate of Conformance” prepared by the contractor in which they promise that they complied with all of the contract requirements, adhered to the specifications, and providing the asset in the condition in which the government ordered it.

It is inevitable that a complex asset such as a ship, submarine, or aircraft will have some minor issue on the date of acceptance both the government and the contractor will work together and endeavor to correct these deviancies so that the contractor gets fully paid the withheld funds, and the government has a fully operational asset. Examples of deviancies would be radios which do not work, light bulbs that are burned out, propeller shafts that wobble, cables not being properly secured, and other issues that are caused by either shoddy workmanship, defective materials, or a combination of a lack of oversight or weak project management.

The DD250 will also have as an attachment the results of specialized testing required by the government, or specialized certifications, which are required as, part of the acceptance process. An example of this is that an asset, which passes or accesses classified communications networks must pass a series of classified, tests to include NONSTOP evaluations, HIJACK studies, TEMPEST evaluations, and TSCM inspections.

The most basic, and most critical of these tests which would take place prior to the DD250 being completed, and the asset being accepted by the U.S. Government, would be the operational testing and inspection of all communication equipment, and the completion of both a physical, visual, and instrumented TEMPEST inspection. Once the asset has been accepted and all of the deficiencies corrected the asset would be fully transferred into government control and additional signal testing. This would include, but

not be limited to additional TEMPEST testing, HIJACK studies, NONSTOP countermeasures, and TSCM inspections, which are difficult, or impossible to perform unless the ship or other asset construction was completely finished and all the prior problems or discrepancies fully resolved.

At this point the government would authorize the asset (in this case a ship) to have an IATO or "Interim Authority to Operate" which means that a limited amount of classified information or equipment could be brought onto the asset to facilitate further testing, and to initiate shakedown or seaworthiness testing. An example of this would be ciphers and codes that would be needed to permit the radios to pass classified communications, and to permit classified testing to take place.

Classified testing, or the testing of classified systems would then be undertaken under the IATO, and once completed and all problems noted during the classified testing were resolved the contractor would receive their funds that had previously been withheld, and the government agencies to whom the asset belongs would issue the Final Authority to Operate or ATO.

The time between the DD250 being signed and the asset being accepted by the government, and the final ATO being issued is a major liability for the government. The longer the duration of this time the greater the problems are with the asset. If, for example, the government accepts a ship, but the ATO is not granted until two years later, the ship has essentially been sitting unused while the deviancies were corrected. The length of this delay is also a key indicator of the competence of the contractor, and the oversight and effectiveness of the government contracting office.

My professional opinion for the ideal situation is for the contractor not be paid the final 30% of any contract until the asset is delivered in full (with zero discrepancies or shortages), the asset is then formally accepted by the government, testing by the government is fully completed, and all deviancies resolved by the contractor to the government's satisfaction in a reasonable amount of time.

Contractors struggle to deliver assets as quickly as they can, but in so doing, details are often missed, or standards and contracts are not complied with. In a rush to complete a multi-million, or even multi-billion dollar project the contractor may well cut corners or falsify test results to get the government to accept the asset before work is actually complete and in turn to receive the bulk of the money they are due for the project. The contractor then lists the incomplete work on the DD250, and the government inspectors then document those additional things, which the contractor failed to mention. This permits the contractor additional time to complete the work after the acceptance, which should have actually been completed PRIOR to acceptance that sadly, this is a type of soft procurement fraud on the part of the contractor.

Ships That May Leak Secrets Things

To be very specific, prior to the Coast Guard taking delivery of the USCG Cutter Matagorda the USCG TEMPEST Program Manager and the Navy SPAWAR TEMPEST Authority initiated a visual and instrumented TEMPEST inspection of the Matagorda. The cost of this inspection is listed in the DD250 for this ship on page 2, as line item 55-5 in the amount of \$121,000.

On examination of the DD250, in attachment C to the ICGS Certificate of Conformance, exceptions listed for incomplete or defective services or equipment were noted in detail.

Examples of the significant number of exceptions or failures found on the USCG Cutter Matagorda were engine control cables not working properly, massive failures of the TEMPEST requirements, security cameras not being properly mounted, communications systems being inoperative, power supplies and wiring being defective and highly hazardous PVC jacketed wiring being used aboard the ship.

In lieu of resolving some of these problems, the exceptions (failures) were simply overlooked, and waivers were granted, not only on the Matagorda, but on the other ships as well. Instead of removing the hazardous PVC cables, a waiver was issued to keep them on board, and thus to recklessly endanger the crew.

Instead of correcting, the TEMPEST failures and performing a second instrumented inspection the Coast Guard neglected to perform the second instrumented inspection that was mentioned in attachment C, and instead just made token changes and issued waivers for the rest of the problems.

This pattern of behavior is also seen in the other ships where follow-up instrumented inspections were not completed after the first inspections failed, or the initial instrumented inspections were never performed at all.

In that case, of one ship (PADRE) a follow-up instrument TEMPEST inspection was only initiated after a Department of Homeland Security - Inspector General Investigation was initiated to investigate fraud within the contracting and delivery of these ships. It is unclear as to who performed the second instrumented TEMPEST inspection on the PADRE, but it does not appear that it was a government entity.

TEMPEST Problems within the 123' Deepwater Cutter/Patrol Boat Program

Matagorda (1303)

TEMPEST Inspect: 24-Feb-04 (failed) [Initial Instrumented SPAWAR Sweep]
Delivered: 01-Mar-04
Authority to Operate: 14-Oct-04
TEMPEST Inspect: 19-Dec-04 (failed again, 29 unresolved problems)
Date Entered Service: 07-Sep-05
TEMPEST Inspect: 03-Aug-05 (failed again, 14 significant unresolved problems)
DHS-OIG Report: 11-Aug-06 (Uncovers failures on many systems)
123" Shutdown: 30-Nov-06 (Coast Guard finds cracks in all 8 ships... they leak)
DHS-OIG Report: 09-Feb-07 (Uncovers Massive Project Failure)

Attachment C of the 1st DD250 (Matagorda) specifies a SPAWAR TEMPEST Instrumented Survey must be re-performed (this would have been the SECOND instrumented survey) after the first instrumented inspection failed.

Further, there was absolutely no plan in place for the TEMPEST element of this project prior to the acceptance of this ship on 01-Mar-04, and no plan of action until after the government TEMPEST inspections failed miserably during the inspection in February of 2004.

However, in the cases of the three ships delivered after the acceptance of this first ship the contractor began charging the government \$5,000 to provide a "TEMPEST POA&M", which means that the government and the contractor had no plan in place for the first ship, but that such a plan was put in place after the fact for the second, third, and fourth ships.

The notable issue with the first ship (Matagorda) is that it was the only ship on which an actual instrumented TEMPEST inspection was performed prior to acceptance. The cost in line item 55-5 of the Matagorda DD-250 shows a charge of \$121,000 and reflects that a SPAWAR TEMPEST inspection team was onsite for 7 days to survey the vessel.

Typically (but not always) this is a 6 man team with a man hour requirement of 300 to 350 man hours on site for a vessel of this size and complexity, plus preparatory time, report writing, and expenses. The industry standard for a government or contractor TEMPEST team is \$2500 per man-day, plus all expenses, and per diem. However, the TEMPEST inspection can also be performed by only 2-3 people if they are highly skilled and properly equipped, but most U.S. Government TSCM, TEMPEST teams and CTTA's tend to be ill equipped, and ill staffed.

A TEMPEST team can also involve several dozen people, with only 2-3 members actually doing the work. It is even more disturbing because the "actual talent" of a TEMPEST team is often just one person (the CTTA) who is taking the measurements, then 1-2 extra people to adjust antennas, switch cables, and twirling knobs, and then a

group who sort of stands behind the scenes in support functions of the small number of people who are actually doing the inspection.

It is quite possible for a small team of only two skilled engineers using the proper equipment to perform an instrumented TEMPEST inspection of a vessel of this size and complexity in as little as 7 days, although most of the work will be performed by computer controlled test equipment that merely needs a human to baby sit the equipment and periodically move a cable or to adjust an antenna.

If in fact, SPAWAR provided a smaller two man instrumented inspection team (or even a single engineer) the expense of \$121,000 is extremely excessive and should have been about a quarter of this amount, or less.

There needs to be a detailed break down of the charges for the initial \$121,000 that was spent on the 7-day TEMPEST inspection. For example, how much was spent of travel, how much on freight, how much for actual on-site measurements, how much was spent off site, how much time was a spent writing report, and so on. All of this information is totally unclassified, but it will help to prove/disprove that the instrumented tests were falsified or not. For example, if the SPAWAR CTTA came out from San Diego there would be a charge for his and his teams airplane ticket, and there would be freight charges for shipping his (several tons) of equipment out to the shipyard.

The delicate issue here is that the Coast Guard did the visual TEMPEST inspection, but the instrumented TEMPEST team was from SPAWAR (Navy), and it was the Coast Guard TEMPEST program manager who found the various serious visual TEMPEST compliance problems and who performed the VTI (Visual Tempest Inspection). We see that the USCG inspector was performing a 3-day visual inspection during the same time that the instrumented inspection by SPAWAR was being performed, which is highly irregular.

If the Coast Guard TEMPEST program manager were not capable of performing the instrumented TEMPEST inspection without the assistance of SPAWAR, then he would have been unqualified to perform the visual inspection as well, and certainly not qualified to issue waivers in regards to TEMPEST matters.

Normally a visual inspection will be performed well in advance of the instrumented inspection is started, not performed at the same time. In fact, the USCG TEMPEST program manager should have made a number of inspections of the ship several times during the build-out months before the acceptance date, and would have visited the ship during the final instrumented TEMPEST inspection (pre-acceptance). Further, the USCG TEMPEST program manager would have been on hand from the time the very first designs for the ship came off the drawing board, and would have inspected the ship dozens of times while it was being built out.

On review of the initial blueprints for this ship, and ships that followed it the Coast Guard program manager would also have discovered several glaring design flaws in that way that racks and panel had been located, and would have discovered that the certain systems were not being properly isolated from other systems.

Should the USCG TEMPEST Manager have actually inspected the wiring, shielding, bonding, grounding, and other systems during the build out many of the TEMPEST problems would have been identified and corrected well before the SPAWAR TEMPEST instrumented testing. The program manager's periodic visits and implementation of the immediate corrective measures may have slowed the production cycle down a bit, but there would not have been such a huge number of flaws detected during the instrumented inspection, and what appears to be a fairly ugly failure of both the visual and the instrumented inspection.

As a result of the TEMPEST program manager, not performing these periodic inspections the contractor was paid for incomplete and defective work, and the ship failed its first instrumented TEMPEST inspection. As there was no plan of action and milestones laid out in advance for this project, there could not have been an implementation of a plan that did not exist.

This serious bungling of the scheduling of the TEMPEST inspections appears to be a trend that was following into the other ships as well, and not a situation isolated to just this first ship.

Towards the end of the Matagorda's DD250 documents, it states "TEMPEST re-inspections will not be required if Matagorda's C4ISR configuration is the same as the 123 class vessel tested in Step 2". Sadly, the TEMPEST inspector appears to be saying that if all of the flaws found are resolved that they do not need to come back in for another (expensive) instrumented re-inspection. Nevertheless, this is a serious problem because if you fail a visual or instrumented TEMPEST inspection due to equipment not being installed correctly, you have to correct the error, and then completely repeat the entire TEMPEST inspection. Now if the equipment does not change, then there is no reason to repeat the TEMPEST inspection as the results will be the same as the original inspection. The document also contradicts itself in also stating that the instrumented TEMPEST survey needed to be repeated by SPAWAR.

This is an example of the "double speak" that was observed throughout the Coast Guard documents on this matter. For example, the TEMPEST inspector is saying that you must repair several problems, but that the TEMPEST inspection does not need to be repeated so long as the equipment is unchanged. If the equipment is in fact modified (by so much as a single wire) then the whole inspection has to be performed again. So, the TEMPEST inspection team is telling the Coast Guard to go away and stop bothering them, but they are couching their wording in such a way so as not to tip off USCG leadership as to the severity of the problem, or in other words, they are using "double speak" to conceal a very dangerous and very significant problem.

The DD250 for this ship further conflicts with itself where a second instrumented TEMPEST inspection was ordered to be performed by SPAWAR, but there is no record that this second inspection ever took place, and records created since the government accepted this ship indicate that to second instrumented inspect has yet taken place.

It is my professional that the MATAGORDA was not capable of passing both a visual

and instrumented inspection, and that the failures of the tests meant that it could not get IATO. So they fixed a few things, and it failed the TEMPEST inspections yet a second time, so they issued waivers, and ram-rodged the IATO (illegally), loaded up classified information (illegally), performed classified testifying (illegally), then got full ATO (illegally), and continued to operate (illegally) until pulled out of service due to hull cracks.

The MATAGORDA had TEMPEST waivers for any visual discrepancies that were not corrected. There was not a re-test. MATAGORDA Visual TEMPEST Inspection (VTI) was conducted 19-21 February 2004 and produced a list of discrepancies. The Instrumented TEMPEST Survey (ITS) for USCG Cutter MATAGORDA was conducted 18 to 24 February 2004 and the result of the survey is classified SECRET.

MATAGORDA was first given Interim Authority to Operate (IATO) on 14 October 2004 and Authority to Operate (ATO) on 19 January 2005. (Note: IATO followed the COMOPTEVFOR Operational Analysis Assessment (OAA) by approximately 3 weeks.) IATO or ATO cannot be granted if there are any compromising emanations. Specific results cannot be discussed as they are documented in the classified instrumented survey report.

In October 2004, when IATO was granted, MATAGORDA had outstanding discrepancies from her VTI. Visual inspection discrepancies may be waived if, in fact, there are no compromising emanations noted by the ITS. The Secure Electrical Information Processing System was again inspected by Mr. Ronald T. Porter of the Coast Guard Telecommunications and Information Command on 19 December 2004.

The Coast Guard 123 WPB class TEMPEST waivers were established by TISCOM on 12 July 2005. (TISCOM Memorandum 2241). An example of a waiver was for an unclassified radio located within 3 meters of classified servers. This was identified as a discrepancy during visual inspection. The waiver is appropriate since a WPB is a small ship and does not have a large communications room or combat information center (as you would find on a Navy ship or larger Coast Guard cutter) - the size of the communications room on a WPB-123 is only approximately 3 meters by 2.5 meters. This physical size makes it impractical to provide the 3-meter separation. The TEMPEST instrumented survey results were sufficient so the visual inspection discrepancy should be (and was) waived.

The only reason that the ships "passed" and got ATO is that all of the serious problems got waived, but not actually corrected.

It is all about smoke, mirrors, and misdirection.

Metompkin (1325)

Delivered: 13-May-04
TEMPEST Inspect: 04-Aug-04 (one unresolved problem)
Date Entered Service: 03-Mar-05 (began service before being issued ATO)
Authority to Operate: 06-Apr-05
123" Shutdown: 30-Nov-06 (Coast Guard finds cracks in all 8 ships... they leak)
DHS-OIG Report: 09-Feb-07 (Uncovers Massive Project Failure)

Attachment D of the 2nd DD250 (Metompkin) mentions that a SPAWAR instrumented inspection was performed, but there is no mention that SPAWAR specifically had to perform the future instrumented inspections, nor is it mentioned that additional instrumented inspections would be required.

It also appears that there is a falsified documents listed as Attachment D on this DD250, where there appears to be a claim that instrumented TEMPEST inspections took place when there is evidence in other documents that these inspections did not take place. Records appear to have been either falsified the doctored.

The acceptance date was just over two months after the Matagorda and there does not appear to be a charge on the DD250 for an instrumented inspection, but there is a charge of \$5,000 to prepare a TEMPEST "Plan of Action and Mile Stones" of POA&M, plus a charge of \$3,000 for the "classified testing" which would actually have been the preparation of a POA&M for the TEMPEST and classified testing, not the actual testing itself.

Further, into the TEMPEST issues resolution and classified testing segment of the Metompkin there are comments that would lead someone reading the report to suspect that an instrumented inspection was performed, but since there is no charge for such an inspection on the DD250 the instrumented inspection may have been falsified after the massive failure of the first ship. Since the Visual and Instrumented TEMPEST inspection both failed, the "classified testing" could not take place as ciphering or keying materials (KEYMAT) could not be loaded into a suspect system that was or could be leaking classified information.

The "TEMPEST visual inspection" of the Metompkin was performed independent of an instrumented inspection (as it should be), but the charges for an instrumented inspection does not appear on the DD250 for this ship, and as such it is likely that no such instrumented survey ever actually took place.

On Metompkin there is an \$8000 holdback to resolve the major three TEMPEST problems. However, if the cost of making these repairs exceeds the held back money (which it does) it is common for the contractor to merely absorb the \$8,000 as a loss instead of throwing good money after bad. This means that the USCG would have to pay the many thousands of dollars to resolve the problems, and merely not pay the contract to held back \$8,000 as liquidated damages.

Unless a documents can be found the specifically states that all of the visual and cabling items were resolved, that it passed a second visual AND instrumented inspection you should assume that the ships leak secrets, and you should assume that the original TEMPEST inspections were either falsified or the records doctored.

The Metompkin does not appear to have had an instrumented TEMPEST inspection performed, but does appear to have had a visual inspection performed. This would have been in-line with SPAWAR CTTA possibly rebuking the USCG TEMPEST Program Manager over wasting their time for not having completed a visual TEMPEST inspection completed prior to scheduling an instrumented inspection.

Most, but not all TEMPEST and TSCM specialists tends to be extraordinarily attentive to even the slightest technical details, and are absolutely obsessed with following rigid rules and guidelines for these kinds of inspections, and keeping a tight hold to the technical specifications and guidance under which they operate. The technicians and engineers in these professions recognize the gravity of that they are trying to protect, and the grave consequences of equipment that leaks secrets.

On the Metompkin, the DD250 bill is incomplete. The question that needs to be resolved is the possibility that the charge for the instrumented was not individually noted -- but the holdback of \$8000 was noted (pending correction of the deficiencies noted in the instrumented inspection).

In the Navy OAA II document dated 27-Apr-2005, on page 2 of the chart (item 1.4), second square down on the right-hand side, there is a description of on-going problems with the LTP (local tactical picture) and COP (common operational picture, to the extent that the system was not yet approved for classified communications and could not be used for actual operations.

The Navy OAA II report further details in line item 1.11 (page 4) that the cutter was unable to pass TEMPEST testing and that as a result it was unable to obtain access to classified or sensitive information.

I have very carefully studied the documents received to date, and in my opinion, the faults found on the visual inspection are truly appalling. The contractor must know that they cannot offer this kind of shoddy workmanship on a U.S. Government asset. For example, the placing of the IFF cable into the same area as the classified data lines could have resulted in a massive breach of classified materials as the signals from this IFF cable would have mixed with the classified signals and carried them quite some distance from the ship. Had this not been caught by the visual TEMPEST Inspection it could have results in an enormous leak of highly classified information that would have affected not only this ship, but also all ships, and all aircraft in the U.S. Inventory.

The contractor who performed all of this work, and the Coast Guard people responsible for the pre-acceptance inspections (pre instrumented TEMPEST inspections) are grossly at fault here, and their careless disregard for the protection of classified information presents a serious liability to our national security.

Padre (1328)

Delivered: 24-Jun-04
TEMPEST Inspect: 28-Jan-05 (failed, 11 unresolved problems or “waives”)
Authority to Operate: 22-Jun-05
Date Entered Service: 22-Mar-05 (began service before being issued ATO)
123” Shutdown: 30-Nov-06 (Coast Guard finds cracks in all 8 ships... they leak)
DHS-OIG Report: 09-Feb-07 (Uncovers Massive Project Failure)

The "TEMPEST visual inspection" of the Padre was performed independent of an instrumented inspection (as it should be), but the charges for an instrumented inspection does not appear on the DD250 for this ship.

There also appear to be only a single visual inspection of the PADRE that took place just prior to the acceptance, and not a series of inspections at specific milestones along the build out.

Attachment D of the 3rd DD250 (Padre) mentions that a SPAWAR instrumented inspection was performed, but there is no mention that SPAWAR specifically had to perform the future instrumented inspections, nor is it mentioned that additional instrumented inspections would be required.

It also appears that there is a falsified documents listed as Attachment D on this DD250, where there appears to be claims that the instrumented TEMPEST inspections took place when there is every evidence found in other documents, that these inspections did not take place but were instead either falsified or the record doctored.

This ship also entered service before is had been granted an official Authority to Operate, which indicates that the ship may have had classified materials on board and was passing classified traffic and connecting to classified networks, but that it was not legal for it to have such access.

Further this ship was later the subject of an Inspector Generals investigation, and was submitted for its first instrumented TEMPEST inspection, but there seems to be some confusions to the issue of a fully instrumented inspection taking place by an independent inspector, or if the instrumented inspection was hindered by waivers that permitted an otherwise defective ship to pass the inspection, but still to be leaking classified information.

Attu (1317)

Delivered: 02-Aug-04
Authority to Operate: 14-Oct-04
Date Entered Service: 12-May-05
TEMPEST Inspect: 03-Aug-05 (failed, 15 unresolved problems)
123" Shutdown: 30-Nov-06 (Coast Guard finds cracks in all 8 ships... they leak)
DHS-OIG Report: 09-Feb-07 (Uncovers Massive Project Failure)

The "TEMPEST visual inspection" of the Attu was performed independent of an instrumented inspection (as it should be), but the charges for the instrumented inspection does not appear on the DD250 for this ship.

Attachment C of the 4th DD250 (Attu) mentions that a SPAWAR instrumented inspection was performed, but there is no mention that SPAWAR specifically had to perform the future instrumented inspections, nor is it mentioned that additional instrumented inspections would be required.

It also appears that there is a falsified documents listed as Attachment D on this DD250, where their appears to be claims that an instrumented TEMPEST inspection took place when there is evidence in other documents that these inspections did not take place but were instead either falsified or the record doctored.

Nunivak (1306)

Delivered: 14-Feb-05
TEMPEST Inspect: 07-Sep-05 (5 unresolved problems)
Authority to Operate: 10-Feb-06
Date Entered Service: 24-Mar-06
123" Shutdown: 30-Nov-06 (Coast Guard finds cracks in all 8 ships... they leak)
DHS-OIG Report: 09-Feb-07 (Uncovers Massive Project Failure)

The Nunivak DD250 does not contain any charges for a TEMPEST POA&M, or for any classified training.

The DD250's for this ship does not contain any mention of, schedules for, charges in regards to, or any indication that TEMPEST or TEMPEST related work, surveys, or planning was every undertaken, completed, or even discussed.

There is a very high probability that this ship was never approved for legitimate classified equipment, codes, ciphers, or to access the classified systems of other agencies. The ship would have essentially of no value in support of the Coast Guard mission.

There also appears to be a number of TEMPEST waivers that the Coast Guard issued as a method of making the problems go away on paper, but not in real life, and that the ship may have in fact been illegally gaining access to classified systems via insecure equipment if such were being made from the ship.

Vashon (1308)

Delivered: 09-Mar-05
TEMPEST Inspect: 17-Mar-05 (failed, 5 unresolved problems)
Authority to Operate: 10-Feb-06
Date Entered Service: 08-Aug-06
123" Shutdown: 30-Nov-06 (Coast Guard finds cracks in all 8 ships... they leak)
DHS-OIG Report: 09-Feb-07 (Uncovers Massive Project Failure)

The DD250's for this ship does not contain any mention of, schedules for, charges in regards to, or any indication that TEMPEST or TEMPEST related work, surveys, or planning was every undertaken, completed, or even discussed.

There is a very high probability that this ship was never approved for legitimate classified equipment, codes, ciphers, or to access the classified systems of other agencies. The ship would have essentially of no value in support of the Coast Guard mission.

There also appears to be a number of TEMPEST waivers that the Coast Guard issued as a method of making the problems go away on paper, but not in real life, and that the ship may have in fact been illegally gaining access to classified systems via insecure equipment if such were being made from the ship.

Monhegan (1305)

Delivered: 03-Oct-05
Authority to Operate: 10-Feb-06
TEMPEST Inspect: 03-Nov-06 (failed again, 19 major problems)
123" Shutdown: 30-Nov-06 (Coast Guard finds cracks in all 8 ships... they leak)
DHS-OIG Report: 09-Feb-07 (Uncovers Massive Project Failure)
Date Entered Service: Not Operating, Never Actually Used

The DD250's for this ship does not contain any mention of, schedules for, charges in regards to, or any indication that TEMPEST or TEMPEST related work, surveys, or planning was every undertaken, completed, or even discussed.

There is a very high probability that this ship was never approved for legitimate classified equipment, codes, ciphers, or to access the classified systems of other agencies. The ship would have essentially of no value in support of the Coast Guard mission.

There also appears to be a number of TEMPEST waivers that the Coast Guard issued as a method of making the problems go away on paper, but not in real life, and that the ship may have in fact been illegally gaining access to classified systems via insecure equipment if such were being made from the ship.

Manitou (1302)

Delivered: 13-Jan-06
TEMPEST Inspect: 23-Jan-06 (failed again, 14 unresolved problems)
Authority to Operate: 10-Feb-06
Date Entered Service: 05-Apr-06
123" Shutdown: 30-Nov-06 (Coast Guard finds cracks in all 8 ships... they leak)
DHS-OIG Report: 09-Feb-07 (Uncovers Massive Project Failure)

The DD250's for this ship does not contain any mention of, schedules for, charges in regards to, or any indication that TEMPEST or TEMPEST related work, surveys, or planning was every undertaken, completed, or even discussed.

There is a very high probability that this ship was never approved for legitimate classified equipment, codes, ciphers, or to access the classified systems of other agencies. The ship would have essentially of no value in support of the Coast Guard mission.

There also appears to be a number of TEMPEST waivers that the Coast Guard issued as a method of making the problems go away on paper, but not in real life, and that the ship may have in fact been illegally gaining access to classified systems via insecure equipment if such were being made from the ship.

123' Cutters Present a "High Risk"

In a letter to Congress (attached Rupprecht letter dated 13-Apr-07), the Coast Guard admits the 123' class of cutters represented a "high risk" for physical connectivity in regards to TEMPEST, COMSEC and related technical security disciplines. Essentially, the first four cutters failed inspections, and were deemed a TEMPEST and COMSEC hazard. While the Coast Guard resolved several of these issues that created the initial test failures, other problems were simply ignored, or were issued waivers.

The issuing of these waivers circumvented the TEMPEST inspection failures, and rather than resolving the TEMPEST issues, the Coast Guard merely pretended that they did not exist to "certify" the cutters. This allowed the Coast Guard to tell SPAWAR that the cutters now were certified, and as such they could now handle classified information, even though this was a "high risk" proposition.

By permitting the Coast Guard to certify their own assets, a very dangerous situation has developed that endangers national security. If these problems are present in the 123' cutter, Deepwater program they are likely present in other Deepwater and related programs as well.

I would encourage the government to freeze all work, on all ships or projects the Deepwater, firms are involved in until competent inspectors can get on-board and rigorously review the work that has been performed to date to ensure that ships will pass both rigorous a visual TEMPEST and instrumented inspection without waivers, falsified test results, or doctored documents.

Further, I would strongly recommend that the ships that were previously built by this firm be carefully reviewed in regards to both visually and with instrumented TEMPEST inspections to see if previous problems have been corrected, or if indeed any of them have actually fully passed as opposed to being waived.

This is a very, very grave situation, and a waste of \$64 million dollars that the Coast Guard could have used for better things... please do not let it continue.

An Organized Pattern of Malfeasance

This pattern of malfeasance and oversight problem can be explained in the following way.

- 1) There was never a plan to have these ships pass a TEMPEST inspection in place when the ships were being built, nor considered when the initial contracts and blueprints were drafted.
- 2) When the ships were built the classified communications systems were installed in a haphazard manner, with little or no regard to industry and/or U.S. government standards.
- 3) The configuration of the equipment, positioning, shielding, bonding, and grounding did not comply with that required to protect classified information systems.
- 4) These ships leak secrets, and based on the documents, which I have examined and some of which are attached to this document I, feel that they continue to leak secrets to this day.
- 5) Just prior to acceptance several of these ships were subjected to a visual and instrumented TEMPEST inspection, and in all cases, the ships failed both the visual and the instrumented inspections.
- 6) The contractor has not completed the remedial actions required for the ships to pass either a full visual or an instrumented TEMPEST inspection.
- 7) As such the ships are not allowed to have classified ciphering materials, scramblers, classified software, or classified operating systems on board as adding these systems to the ship would result in the unauthorized disclosure of classified information.
- 8) The ships have to fully clear both a SERIES of visual inspections during build out, then a simulator inspection (which is often not performed), then an instrumented inspection, and they apply for a interim authority to operate, and with this IATO they can load the ciphers and software that will allow them to pass classified information into the C4ISR systems on-board the ships.
- 9) But, this assumes that the C4ISR systems themselves have been deemed secure independent from the TEMPEST testing. TEMPEST deals with the hardware side of the problems, but the C4ISR systems must also pass a series of standards that deals with finding backdoors in the computers and evaluating weak points in the software and firmware. There is significant documentation that the systems on board these ships also failed the software security examinations as well as the TEMPEST inspections.

10) Once everything passes the actual authority to operate (ATO) is granted, the C4ISR systems becomes live with classified signals and data, and the next phase of testing can be undertaken.

11) At this point you would normally perform NONSTOP evaluations and search for any HIJACK vulnerabilities (you have to have classified data and all communications systems usable and data seamlessly flowing to do this,) and would then begin the classified testing.

12) Once the government fully takes over the ship, but before it is dispatched on a real-world mission the ship would normally be subjected to a TSCM or Technical Surveillance Measures inspection to ensure that no eavesdropping devices are present. During this TSCM inspection, the TEMPEST inspection would be repeated to include the visual and instrumented inspection that would be far more rigorous than the original TEMPEST inspections.

13) It would be highly desirable for the TSCM team, and the TEMPEST inspectors involved in these final series of inspections to not have any prior involvement in prior Deepwater ships, no links to ICGS, and no links to Lockheed,

Mind Set

The mind-set of a TEMPEST inspector is that nothing is there until you can prove otherwise. Their job is to stop or limit compromising emanations and the technical leaks of classified information.

A TSCM inspector on the other hand always assumes that an eavesdropper is active or that a bugging device is present until they can scientifically prove otherwise. As you can see a TEMPEST, inspection has a different assumption than that of a TSCM inspection that is why both need to be performed before a vessel is operated in earnest.

The Bottom Line

These ships have since been decommissioned due to the hulls cracking and water leaks, due to a poorly designed modification and shoddy workmanship. There is good reason to believe they will never be in service again. Once the hulls cracked, all efforts to resolve the TEMPEST problems appear to have been completely suspended.

The Coast Guard now has eight worthless ships, for which they wasted \$64 million dollars... how much money have they wasted on other assets that do not work, and will the new National Security Cutter be as equally a monumental failure... will it actually float, or will it too develop huge cracks in the hull and massive leaks of classified information?

Recommendations

Salvage all usable electronics, tactical, and mechanical equipment from all eight cutters.

Sell the stripped ships for scrap metal

Demand a partial refund of monies from ICGS, and consider DLA debarment proceedings the responsible contractors for fraud.

Immediately suspend all projects associated with ICGS and with Lockheed Martin in regards to the Deepwater program until all Coast Guard assets have been completely brought up to par, and completely re-inspected from scratch.

Request that this Committee and the U.S. Department of Justice investigate the faulty workmanship that caused the hull cracks, and all other shoddy workmanship present on this project, and that criminal proceedings be undertaken should such be warranted.

Request the U.S. Department of Justice immediately initiate a counterintelligence investigation into the TEMPEST flaws on these ships to determine if these flaws were the result of the efforts of a foreign government, or merely just shoddy design and workmanship.

Request the U.S. Government, and more specifically the TEMPEST engineers and students from the National Security Agency be allowed to examine this ship as a “lesson learned” program before the ships are dismantled or stripped. By studying the problems (that still doubtlessly exists) in these ships, the national TEMPEST and TSCM can be enhanced as a whole by learning from these mistakes. This would turn these eight ships into a temporary training range for the TSCM and TEMPEST profession.

Conduct an investigation into the entire Coast Guard TEMPEST program to determine the extent to which the USCG was, or is issuing waivers in lieu of legitimate TEMPEST inspections, installations, maintenance, and repairs.

It appears that none of the ships has ever actually passed a TEMPEST inspection, and that a huge number of major flaws were found on all ships, and that after the first four of ships grossly failing that they stopped all TEMPEST testing for the second four ships.

In order to perform a TEMPEST, NONSTOP, and HIJACK testing you must have all operational gear installed and active. If the piece of equipment requires a key to operate (such as the ARC-210) you use a testing key or a simulator during the testing, and then once you have IATO authority to operate you can load up the real keys and software, and retest.

Your Committee also needs to request the work schedules of all USCG, and SPAWAR TEMPEST employees and contractors to see how often they went out to the shipyard before the instrumented tests, and then investigate their activities during the periods of interest. Essentially, you want to see all of their movements and activities during the

entire deepwater program.

In my professional opinion none of the ships (all 8 of them) are capable of passing either a visual or an instrumented TEMPEST examination, but rather failed miserably, which required that the government hold back money until the failure points were corrected. There this minimal documentation that any of these problems were actually fully corrected after delivery (other than a few minor problems, when the major problems were ignored).

The bottom line, is that based on the documents I have reviewed these ships are all a major liability to our national defense.

It is possible that the USCG has corrected the entire problem, and has had the ships subjected to a new visual and instrumented inspection, but there is no documentation to even hope that they have done this.

The Coast Guard has been very obstructive to this inquiry, has not been reasonably responsive in providing information, and instead provides mere fragments. They seem to issuing glowing press releases about the Deepwater program instead releasing the documents detailing the TEMPEST and other problems. In a nutshell, the Coast Guard has been giving this committee nothing but lip service.

While the Navy did not actually certify the TEMPEST inspections, but were merely contractors that performed the instrumented tests, while the Coast Guard performed the visual inspections.

Instead, the Coast Guard "self certified" themselves, but lacked the technical competencies and equipment to perform the instrumented TEMPEST tests on their own. This is a tell-tale sign that the USCG should not have been involved in their own TEMPEST program at all. The Navy SPAWAR does issue "pass/fail" recommendations on USN installations, but they specifically do not do that for the Coast Guard.

After carefully studying the documents relative to the Coast Guard Deepwater program I have become reasonably convinced that there has likely been criminal conduct and gross negligence on the part of one or more Coast Guard, and Navy employees or members, and that there has likely also been criminal conduct and gross negligence on the part of the contractor, and subcontractors in a secondary capacity.

In my professional opinion the bungling of the Deepwater 123' program (as least on the TEMPEST, COMSEC, Cipherring, and Technical Security side) has resulted in the "losing defense information" and the unauthorized disclosure of classified information, codes, ciphers, and related systems as defined by Title 18, Sec. 793, and Section 798 due to gross negligence.

It is my professional opinion that by the Coast Guard operating these ships absent proper TEMPEST inspections that they, the Navy, and the contractor have disclosed highly classified information to our enemies.

The issuing of these TEMPEST waivers is the smoking gun, and I feel that they are only the tip of the proverbial iceberg.

If the Navy had even the slightest idea that waivers were being claimed and that the problems were not being corrected (but rather falsified or the records doctored) they were duty bound to notify the cognizant authorities that the ships did not meet NSA TEMPEST standards, and hence to move to revoke any waivers.

I believe that the proper terminology is "accessory before the fact", as SPAWAR knew of upcoming illegal activities involving the disclosure of classified information, and while they may not have been the certifying authority for the USCG, he had full knowledge that at least one or more ships failed.

If the USCG is not qualified to perform these instrumented tests themselves, then they are not qualified to issue the waivers either. It is a bit of a double-edged sword of many excuses.

"TEMPEST waivers for any visual discrepancies" can also be called "doctoring a TEMPEST inspection," since they could not get the ship to actually pass the inspection they covered the discrepancies with waivers and falsified documents. In some circles this is also called "pencil whipping" the inspection.

The results of the instrumented TEMPEST inspection are not classified, the actual report is classified, or more specifically 10% of the final report is classified. I would point out that during the DD250 that the USCG discloses that both the visual and instrumented inspections failed.

IATO and ATO can be granted if all of the TEMPEST visual and instrumented violations were falsified with "waivers". They could have also issued waivers for screen doors on submarines, but that does not mean that the submarines will be any safer or more secure.

The "Coast Guard 123 WPB class TEMPEST waivers" comments means that the Coast Guard just decided to abandon the TEMPEST standards and inspections right after PADRE failed (again), but gave PADRE Authority to Operate anyway (with falsified TEMPEST waivers). So discovered that the only way to get the ships to pass was to not inspect them in the first place.

SPAWAR's Involvement and Comments

According to the Navy, visual inspections are normally conducted first so that discrepancies can be corrected before the instrumented test, which is comparatively both expensive and time consuming. However, there is no technical reason to preclude doing both at the same time. Scheduling is a USCG decision. They do not recall when the visual inspection was done since SPAWAR did not perform the visual inspection. The USCG may have performed the visual inspection during the first day since SPAWAR had the night shift. SPAWAR recalls having information about visual discrepancies during the test, but do not recall the details. However, it was SPAWAR's understanding at the

time that Lockheed Martin did not intend to correct visual discrepancies, so there was no reason to perform the visual inspection in advance of the instrumented test.

Lockheed Martin/ICGS has stated that they were not responsible for TEMPEST; SPAWAR claimed that they could only run the instrumented tests, but could not certify anything. The Coast Guard lacked the expertise, equipment, or resources to perform their own inspections so it turned into a case of everybody claimed that someone else was responsible for the problem.

SPAWAR tested two 123' hulls, the USCGC Matagorda in February 2004 and the USCGC Padre in July 2006. SPAWAR did not track or record installation changes between the hulls, nor was that a requirement--SPAWAR just tested what was equipment was there when they conducted the test. The test results are again classified. SPAWAR did not make a recommendation, either for or against, TEMPEST certification in the report for the Padre.

The Coast Guard and ICGS is Playing Games

While MIL-HDBK-232A does involve many TEMPEST topic matters it is not the "Core Document", nor should it be considered "THE" TEMPEST standard by any means. If MIL-HDBK-232A is the only document, which they list as the only contractual requirement, then there was never any formal requirement for TEMPEST compliance in the program, only a specification of distances between equipment and cables.

The Coast Guard had admitted that the only standard or protocol that they required for TEMPEST certification was only one publications, that being "MIL-HDBK-232A" A list of relevant government standards, which should have been listed within the contracts and the designs, are amended to this document.

When the ships began failing all of their TEMPEST inspections the issue of "other standard and specifications" started being brought up. While we initially see that the USCG and SPAWAR quoted violations in regards to NSTISSAN 2-95 and IA PUB 5239-31, but in October 2005, the USCG inspector began trying to apply Air Force standards to the matter at hand to obtain a waiver.

This dragging in an Air Force standard is a case of "document shopping" where the Coast Guard and/or ICGS didn't like what the NSA standards for TEMPEST said, so they shopped around for another government standard that they could quote that would let them get away with a waiver of a dangerous situation.

This is akin to a child not liking the answer one parent give them, only to run to the other parent to ask the same question in order to get an override.

The interesting issue here is that by seeking a waiver under AFMAN 33-214V2, the Coast Guard states that cheap Mylar/foil shielding may be used in cases where the digital signals are less the 5,000 bits per second (or 5Kbps). The CAT 5E cables that are at issue are actually capable of speeds up to, and in excess of 100 million bits per second (or

100Mbps), or twenty thousand times faster. If the cable were merely used for ISDN communications for a STE connection then the data speeds involved would be 192kbps, which is 38 times faster than the USAF specification. In either regards, bringing up an Air Force specification, as an excuse as to why the Coast Guard should issue a waiver on the matter is ludicrous, but it also shows just how desperate the Coast Guard was to cover up the problem.

In Summary

I have serious discomfort and grave concerns with the prospect of any further asset deliveries, given what I have seen by studying documents regarding the Deepwater program... the men and women of the Coast Guard have a tough job to do, and they deserve better than ships that leak, and are unusable.

It has been an honor to be of service to my country in this matter, and an honor to render assistance to this committee.

Thank you,

James M. Atkinson

Amendment One

At an absolute minimal, these ships should have rigorously adhered to the following government standards in concerning TEMPEST and their associated disciplines. These standards should have been adhered to from the date the first drawings were prepared until the current time.

NSA-82-89, NACSIM 5000, TEMPEST Fundamentals, National Security Agency.

NACSIM 5004, Tempest Countermeasures for Facilities within the United States, National COMSEC Instruction

NACSIM 5005, Tempest Countermeasures for Facilities outside the United States, National COMSEC Instruction, NACSIM 5005

NACSIM 5009, Technical Rational: Basis for Electromagnetic Compromising Emanations Limits

NACSIM 5100A Compromising Emanations Laboratory Test Requirements, Electromagnetics. National Security Telecommunications and Information System Security (NSTISS)

NACSIM 5108, Receiver and Amplifier Characteristics Measurement Procedures

NACSIM 5109, TEMPEST Testing Fundamentals

NACSIM 5112, NONSTOP Evaluation Techniques

NACSIM 5201, TEMPEST Guidelines for Equipment System Design

NSA 82-90, NACSIM 5203, Guidelines for Facility Design and RED/BLACK Installation, National Security Agency

NSA 65-5, NACSIM 5204, RF Shielded Acoustical Enclosures for Communications Equipment: General Specification, National Security Agency

NSA 65-6, NACSIM 5204, R.F. Shielded Enclosures for Communications Equipment: General Specification, National Security Agency

NSA 73-2A, NACSIM 5204, National Security Agency Specification for Foil RF Shielded Enclosure, National Security Agency

NSA 89-01 (Draft), NACSIM 5204, National Security Agency Specification for a High Performance Shielded Enclosure, National Security Agency

NCSC 3, TEMPEST Glossary

NTISSI 4002, Classification Guide for COMSEC Information

NTISSI 7000, National Telecommunications and Information Systems Security Instruction, TEMPEST Countermeasures for Facilities.

NTISSP 300, National Telecommunications and Information Systems Security Policy, National Policy on the Control of Compromising Emanations

NSTISSAM TEMPEST 1-92, Compromising Emanations Laboratory Test Requirements, Electromagnetics. National Security Telecommunications and Information System Security (NSTISS)

NSTISSAM TEMPEST 1-93, Compromising Emanations Field Test Requirements Electromagnetics

NSTISSAM TEMPEST 2-91, Compromising Emanations Analysis Handbook, National Security Telecommunications and Information Systems Security Advisory Memorandum

NSTISSAM TEMPEST 2-92, Procedures for TEMPEST Zoning

NSTISSAM TEMPEST 2-95, RED/BLACK Installation Guidance, National Security Telecommunications and Information Systems Security Advisory Memorandum

NSTISSAM TEMPEST 3-91, Maintenance and Disposition of TEMPEST Equipment

INFOSEC System Security Products & Services Catalog, October 1990, National Security Agency

DOD Directive C-5000.19, Control of Compromising Emanations

MIL-STD-461E, Department of Defense Interface Standard, Requirements for the Control of Electromagnetic Interference Characteristics of Subsystems and Equipment.

MIL-STD-IB8-124B, Military Standard Grounding, Bonding and Shielding for Common Long Haul/Tactical Communication Systems including Ground Based Communications-Electronics Facilities and Equipment.

MIL-HDBK-232, Red/Black Engineering - Installation Guidelines.

MIL-HDBK-411A, Long Haul Communications (DCS), Power and Environmental Control for Physical Plant.

MIL-HDBK-419, Grounding, Bonding, and Shielding for Electronic Equipment and Facilities.

MIL-HDBK-1195, Radio Frequency Shielded Enclosures

MIL-STD-188-124, Grounding, Bonding, and Shielding for Common Long Haul and Tactical Communications Systems.

MIL-STD-285, Method of Attenuation Measurement for Enclosures, Electromagnetic Shielding for Electronic Test Purposes.

FCC 47CFR, Radio Frequency Devices.

MIL-STD-464, Electromagnetic Environmental Effects Requirements for Systems.

MIL-STD-469, Radar Engineering Interface Requirements, Electromagnetic Compatibility Metric.

MIL-STD-1542B, Electromagnetic Compatibility and Grounding Requirements for Space System Facilities.

MIL-HDBK-235/1B, Electromagnetic (Radiated) Environment Considerations for Design and Procurement of Electrical and Electronic Equipment, Subsystems and Systems.

MIL-HDBK-237B, Electromagnetic Environmental Effects on Platforms, Systems, and Equipment.

MIL-HDBK-241B, Design Guide for EMI Reduction in Power Supplies.

MIL-HDBK-1512, Electroexplosive Subsystems, Electrically Initiated, Design Requirements and Test Methods.

MIL-HDBK-1857, Grounding, Bonding and Shielding Design Practices.

OPNAVINST C5510.93E, Navy Implementation of National Policy on Control of Compromising Emanations

AR 380-19-1, Control of Compromising Emanations, September 1990 (Army)

ANSI/IEEE C63.2, Standard for Instrumentation-Electromagnetic Noise and Field Strength, 10 kHz to 40 GHz, Specifications

ANSI/IEEE C63.4, Standard for Electromagnetic Compatibility, Radio-Noise Emissions from Low Voltage Electrical and Electronic Equipment in the Range of 9 kHz to 40 GHz, Methods of Measurement

ANSI/IEEE C63.14, Standard Dictionary for Technologies of Electromagnetic Compatibility (EMC), Electromagnetic Pulse (EMP), and Electrostatic Discharge (ESD)

ANSI/NCSL Z540-1, General Requirements for Calibration Laboratories and Measuring and Test Equipment

Amendment Two

It is my professional recommendation that this Committee request that the Coast Guard immediately supply you the following EXACT information for each of the eight cutters.

The proper answer to each of these questions is either: Yes, No, or a specific date, a person's name, and so on. You should assume that you are being forced to deal with the Coast Guard leadership, as a hostile witness, and that they are being evasive in their direct answers. As such, you must now ask harsh, but questions to which they can only supply simple, yet direct answers.

I recommend that you insist that the Coast Guard provide these exact questions with exact answers and that no answer be qualified with a footnote or answered in any evasive way. I further recommend that you give the Coast Guard one request for each of the eight ships, and that they give you the answer in the form of narrative form.

You may also find it prudent to expand this query to not only include the eight 123' cutters, but also to include all assets in the Coast Guard inventory acquired in the past 10 years to include the National Security Cutter, and all other assets capable of C4ISR access, or with access to classified systems or networks including those which may be legacy assets, and projects that are still on the drawing board.

In regards to Hull/Keel Number xxxx, also known as xxxxx (asset name) please provide the following answers.

1a) What date was the (fill in the asset name and number) subjected to it's first visual TEMPEST inspection by the contractor

1b) On what dates did the contractor provide any additional visual TEMPEST inspections

1c) What were the results of each of these visual tests performed by the contractor

1d) Who performed these visual inspections

1e) What were the results of this inspection

1f) What documentation exists in regards to this inspection

2a) On what dates did the contractor subject the (insert name) cutter to any kind of instrumented TEMPEST inspection

2b) On what dates did the contractor provide any additional instrumented TEMPEST

inspections

2c) What were the results of each of these instrumented tests performed by the contractor

2d) Who performed these instrumented inspections

2e) What were the results of this inspection

2f) What documentation exists in regards to this inspection

3a) What date was the (fill in the name and number) cutter subjected to it's first visual TEMPEST inspection by the USCG

3b) On what dates did the USCG provide any additional visual TEMPEST inspections

3c) What were the results of each of these visual tests performed by the USCG

3d) Who performed these visual inspections

3e) What were the results of this inspection

3f) What documentation exists in regards to this inspection

4a) On what dates did the USCG subject the (insert name) cutter to any kind of instrumented TEMPEST inspection

4b) On what dates did the USCG provide any additional instrumented TEMPEST inspections

4c) What were the results of each of these instrumented tests performed by the contractor

4d) Who performed these instrumented inspections

4e) What were the results of this inspection

4f) What documentation exists in regards to this inspection

5a) What date was the (fill in the name and number) cutter subjected to it's first visual TEMPEST inspection by Space and Naval Warfare Center (SPAWAR)

5b) On what dates did SPAWAR provide any additional visual TEMPEST inspections

5c) What were the results of each of these visual tests performed by the SPAWAR

5d) Who performed these visual inspections on behalf of SPAWAR

5e) What were the results of this inspection performed by SPAWAR

5f) What documentation exists in regards to this inspection by SPAWAR

6a) On what dates did SPAWAR subject the (insert name) cutter to any kind of instrumented TEMPEST inspection

6b) On what dates did SPAWAR provide any additional instrumented TEMPEST inspections

6c) What were the results of each of these instrumented tests performed by SPAWAR

6d) Who performed these instrumented inspections for SPAWAR

6e) What were the results of this inspection by SPAWAR

6f) What documentation exists in regards to this inspection by SPAWAR

7a) What date was the (fill in the name and number) cutter subjected to it's first visual TEMPEST inspection by other U.S. Government agency or contractor to include, but not be limited to the Navy, Army, Department of State, Central Intelligence Agency, DISA, NSA, or any contractor or employee.

7b) On what dates did any other contractor or government agency provide any additional visual TEMPEST inspections

7c) What were the results of each of these visual tests performed by the any other contractor or government agency

7d) Who performed these visual inspections on behalf of any other contractor or government agency

7e) What were the results of this inspection performed by any other contractor or government agency

7f) What documentation exists in regards to this inspection by any other contractor or government agency

8a) On what dates did any other contractor or government agency subject the (insert name) cutter to any kind of instrumented TEMPEST inspection

8b) On what dates did any other contractor or government agency provide any additional instrumented TEMPEST inspections

8c) What were the results of each of these instrumented tests performed by any other contractor or government agency

8d) Who performed these instrumented inspections for any other contractor or government agency

8e) What were the results of this inspection by any other contractor or government agency

8f) What documentation exists in regards to this inspection by any other contractor or government agency

9a) On what date did this ship pass it's latest visual TEMPEST inspection

9b) On what date did this ship pass it's latest instrumented inspection

9c) On what date was the interim authority to operate (IATO) granted

9d) On what date was classified ciphering materials in any form brought on board the ship

9e) On what date was classified keys or ciphering materials loaded into cryptographic equipment, or loaded into radios or other devices capable to utilizing ciphering and/or keying materials.

9f) On what was the classified software loaded onto any computer, radio, or device that may have not been included in the prior question.

9g) One what date was classified testing initiated on this ship, by whom

9h) On what date was classified testing completed on this ship, by whom, and what were the results

9i) On what dates was the NONSTOP evaluation performed on this ship, what countermeasures where performed, and by whom.

9j) One what date was the first authority to operate issued or granted.

9k) After the first authority to operate (ATO) was granted, what was the date of the ciphering materials being changed, from whom, and under what COMSEC account number.

9l) Please list the names and contact information for all COMSEC custodians who provided cipher, COMSEC, or other classified software, firmware, or hardware items to this ship since the USCG took possession from the contractor. This includes all time prior to the IATO, the time between the IATO and the ATO, and all time up to the present date.

- 9m) Provide the date when the ship last passed any classified traffic through any shipboard communications, C4ISR, navigation, cell phone, or other mechanism of security of communications.
- 9n) Provide a date(s) of any TSCM inspection performed on this ship, by whom, what were the results
- 9o) Provide the dates of any COMSEC equipment being removed from the ship
- 9p) Provide the dates that ciphering materials were last removed from the ship
- 9q) Provide the dates that the COMSEC or classified operating software was last removed from the ship
- 9r) Does this ship currently contain any classified COMSEC, Ciphering, or other communications equipment
- 9s) Has any member of the USCG (or any other branch of the military) crew of this ship lost their security clearance, or had it revoked or suspended, or been involved in any judicial or non-judicial disciplinary action. What position did these people serve in, what was the final disposition?
- 9t) What was the highest level of classified information that was ever processed by way of the on-board communications (C4) system, SBU, Confidential, Secret, Top Secret?
- 9u) What date was the ARC-210 removed or decommissioned
- 9v) What date was the IFF or UPX-28 removed or decommissioned
- 9w) What date was the C4ISR system decommissioned, disconnected, or removed.
- 9x) What is the date that the contractor, SPAWAR, or USCG loaded or updated the C4ISR software
- 9y) On what date was the MF/HF or RT-9000 or other elements or the HF system removed or decommissioned
- 10a) Has this ship or other asset traveled into the littoral waters of any nation other than that of the United State, if so when, and what country
- 10b) Has this ship traveled within 250 miles of the coast line of any other nation, if so, when, and what country.
- 10c) Since taking possession of the ship (after the acceptance date noted on the DD250) have any foreign nationals been on this ship, who, for what reason, why, and what access where they allowed on the ship, and where did they go or visit while on-board.

11a) What is the date when the first classified email message or other correspondence of an electronic nature was transmitted or received on this ship

11b) What is the power level on the output of the power amplifier of the IFF system.

11c) What is the power level on the output of the power amplifier of the ARC-210 line of sight system.

11d) What is the power level on the output of the power amplifier of the ARC-210 SATCOM system.

11e) What is the power level on the output of the power amplifier of the MF/HF system.

11f) What is the power level on the output of the power amplifier of the VHF Marine communications system.

11g) What is the power level on the output of the power amplifier of the UHF paging system.

11h) What is the power level on the output of the power amplifier of the RADAR system.

11i) What is the frequency range on the RADAR system.

11j) What is the pulse rate of the RADAR system, what is the pulse rise time, and what is the pulse repetition rate

12a) Has any radio or system on-board this ship been loaded with HAVE QUICK waveforms, related COMSEC keys, ciphering materials, or integrated or external ECM/ECCM modules. If so when where they installed, when where they removed, and by whom.

12b) Has any radio or system on-board this ship been loaded with HAVE QUICK II waveforms, related COMSEC keys, ciphering materials, or integrated or external ECM/ECCM modules. If so when where they installed, when where they removed, and by whom.

12c) Has any radio or system on-board this ship been loaded with SINCGARS waveforms, related COMSEC keys, ciphering materials, or integrated or external ECM/ECCM modules. If so when where they installed, when where they removed, and by whom.

12d) Has any radio or system on-board this ship been loaded with DAMA waveforms, related COMSEC keys, ciphering materials, or integrated or external ECM/ECCM

modules. If so when where they installed, when where they removed, and by whom.

12e) Has any radio or system on-board this ship been loaded with TALON waveforms, related COMSEC keys, ciphering materials, or integrated or external ECM/ECCM modules. If so when where they installed, when where they removed, and by whom.

12f) Has any radio or system on-board this ship been loaded with SATURN waveforms, related COMSEC keys, ciphering materials, or integrated or external ECM/ECCM modules. If so when where they installed, when where they removed, and by whom.

13a) What was this ship first approved for full connection to SIPRNET, to what level

13b) When was this ship last approved for full connection to SIPRNET, what is the current status

13c) At any time was connectivity to SIPRNET ever revoked, denied, or suspended for any reason.

14a) Has any communications system onboard this ship or this asset ever been considered “high risk” by any other government agency such as the Navy or any other agency or contractor.

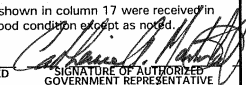
14b) Has any government agency ever refused or declined to provide classified information to this ship or asset due to the risk level presented by the posture or condition of the TEMPEST inspections, COMSEC systems, or C4ISR systems.

Attachments

The following attached documents are completely unclassified, and provide TEMPEST and COMSEC details of how the Coast Guard accepted defective equipment, then how the vessels failed TEMPEST evaluations, how a small number of the TEMPEST problems were resolved, and how the rest were quietly covered up, waived, or ignored to get these cutters rushed into service before it was safe to do so.

This small number of documents is by no means inclusive of those, which were available, but merely those involving the TSCM, TEMPEST, EMI, EMC, COMSEC, C4ISR, and related areas of study.

I strongly recommend that this committee compel the Coast Guard to open a candid and timely release of all unclassified documents relative to all elements of all USCG TEMPEST, TSCM, COMSEC, and C4ISR systems that may involve the Bluewater program, ICGS, and Lockheed Martin.

MATERIAL INSPECTION AND RECEIVING REPORT						Form Approved OMB No. 0704-0248	
The public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing the burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports (0704-0248), 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302. Respondents should be aware that notwithstanding any other provision of law, no person shall be subject to any penalty for failing to comply with a collection of information if it does not display a currently valid OMB control number.							
PLEASE DO NOT RETURN YOUR COMPLETED FORM TO THE ABOVE ADDRESS. SEND THIS FORM IN ACCORDANCE WITH THE INSTRUCTIONS CONTAINED IN THE DFARS, APPENDIX F-401.							
1. PROCUREMENT INSTRUMENT IDENTIFICATION (CONTRACT) NO. DTCG23-02-2DW001		ORDER NO. F-2DW079		6. INVOICE NO./DATE ICGS0300-0008/ 03/01/04		7. PAGE OF 1 2	
2. SHIPMENT NO. NA		3. DATE SHIPPED 1 Mar 04		4. B/L NA TCN NA		5. DISCOUNT TERMS None	
9. PRIME CONTRACTOR CODE Integrated Coast Guard Systems, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209, USA				10. ADMINISTERED BY CODE Commandant (G-ACS-6) U.S. Coast Guard Deepwater SIPO, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209			
11. SHIPPED FROM (If other than 9) CODE Bollinger Shipyards Lockport, L.L.C. PO Box 250 8365 Highway 308 Lockport, LA 70374-0250				12. PAYMENT WILL BE MADE BY CODE Commandant (G-ACS-6) U.S. Coast Guard Headquarters, 2100 Second St. SW, Room 5208, Washington, DC 20591-0001, USA			
13. SHIPPED TO CODE USCGC Matagorda (WPB - 1303), C/O Coast Guard 8365 Highway 308 Lockport, LA 70374-0250				14. MARKED FOR CODE LCDR Driscoll			
15. ITEM NO.	16. STOCK/PART NO. (Indicate number of shipping containers - type of container - container number.)	17. QUANTITY SHIP/REC'D*	18. UNIT	19. UNIT PRICE	20. AMOUNT		
0055	D Services and Supplies: Matagorda, WPB 123 conversion, Item short shipped of the following components: Details on Certificate of Conformance	1/1	Lot	\$14,875,235.00	\$14,875,235.00		
01	Trial Cards	1	Lot	\$196,815.00	\$196,815.00		
02	Provisioning and Spares	1	Lot	\$71,000.00	\$71,000.00		
03	Training	1	Lot	\$10,000	\$10,000.00		
04	CDRL Exceptions	1	Lot	\$243,500.00	\$243,500.00		
21. CONTRACT QUALITY ASSURANCE				22. RECEIVER'S USE			
a. ORIGIN ☐ CQA ☐ ACCEPTANCE of listed items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents.				b. DESTINATION ☐ CQA ☐ ACCEPTANCE of listed items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents.			
DATE _____ SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE _____ TYPED NAME: Certificate of Conformance TITLE: MAILING ADDRESS:				3/1/04  DATE RECEIVED SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE TYPED NAME: Catherine Martindale TITLE: Contracting Officer MAILING ADDRESS: U.S. Coast Guard Deepwater SIPO 1530 Wilson Blvd., Suite 400, Arlington, VA COMMERCIAL TELEPHONE NUMBER: 571-218-3293			
COMMERCIAL TELEPHONE NUMBER: 23. CONTRACTOR USE ONLY				* If quantity received by the Government is the same as quantity shipped, indicate by (X) mark; if different, enter actual quantity received below quantity shipped and encircle.			

DD FORM 250, AUG 2000

PREVIOUS EDITION IS OBSOLETE.

ICGS Certificate of Conformance:

Contract Number: DTCG23-02-C-2DW001

DTO Number: DTCG23-02-F-2DW079, CLIN 0055D

Asset: CGC Matagorda, WPB 1303, 1 of 1

Description: This DTO provides the detailed design and construction for major modification of the 110-foot patrol boat Matagorda, including completion of all design, analyses, construction, and testing to deploy the lead vessel of the proposed 123-Ft Cutter Class, and to demonstrate compliance with requirements. Included in the modifications was an extensive ultrasonic survey of the hull was conducted resulting in the replacement of over 800 square feet of wasted hull plate; a new deckhouse providing an enlarged, 360-degree bridge and berthing for a dual-gender crew; a stern extension with a stern ramp and door for launch and recovery of the Short-Range Prosecutor; an upgraded C4ISR suite to ensure interoperability with the IDS; and all related logistics and training.

I certify that on 1 March 2004, the ICGS Deepwater Program furnished the supplies and/or services called for in accordance with all applicable requirements. I further certify that the supplies and/or services are of the quality specified and conform in all respects with the contract requirements, including specifications, drawings, preservation, packaging, packing, marking requirements, and physical item identification, and are in the quantity shown on the attached acceptance document.

Comment: This Certificate of Conformance is based upon;

- LM/MS2 Certificate of Conformance and supporting records.
- NG/SS Certificate of Conformance and supporting records
- Waiver W001 – Superstructure Aluminum Extrusion ABS Test Results
- ICGS audits of LM/MS2, NG/SS, Chand, and Bollinger (BSI).
- Functional Configuration Audit and Physical Configuration Audit performed on 27 Feb 04
- 123 Cutter Certification Matrix

www.ICGSDeepwater.com

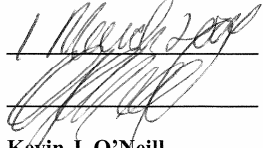
A Limited Liability Company Owned by Northrop Grumman Ship Systems and Lockheed Martin

INTERSTATE COAST GUARD SYSTEMS
DEEPWATER

Exception(s):

- 1) Trial Cards (Attachment A)
- 2) Provisioning and Spares
 - On Board (estimated date of delivery 30 Mar 04)
 - Shore Side (estimated date of delivery 30 Mar 04)
 - Insurance (estimated date of delivery 30 Mar 04)
- 3) Training for the Matagorda crew
 - Common Operating Picture (COP estimated completion 30 Mar 04)
- 4) CDRL Exceptions (Attachment B)
- 5) Tempest and Classified Testing, (Attachment C)
- 6) LIMS Testing
- 7) Low Smoke Cable RFD
- 8) C005 3.2 Verification
- 9) Engine Control Cable

Date of Execution: 1 March 2007

Signature: 

Kevin J. O'Neill
Director of Contracts, ICGS LLC

Attachment C
Tempest and Classified Testing

ICGS will review the outstanding TEMPEST discrepancies described in the final SPAWAR Instrumented TEMPEST Report conducted on CGC MATAGORDA during the week of 18Feb-24Feb 2004 and correct discrepancies if the required changes are clearly defined within the scope of the contract. ICGS will demonstrate the proper operation of C4ISR systems in a real-world classified environment. Agreed to MATAGORDA TEMPEST discrepancies to be resolved and classified testing to be successfully performed prior to June 24, 2004 (90 days after the receipt of the instrumented survey report). This effort shall be completed in the following phased manner, as each step is successfully completed that portion of the withholding listed will be released:

Step 1 Develop POA&M: Prepare and deliver Plan of Action and Milestones (POA&M) document which describes the schedule, locations, and resources needed to implement the following activities: (upon completion, ICGS receives 40% of the withholding)

- ☐ Development of design solutions to correct within scope MATAGORDA TEMPEST discrepancies outlined in the final SPAWAR TEMPEST Report.
- ☐ Installation of within scope design solutions to correct TEMPEST discrepancies aboard a 123 WPB class vessel
- ☐ Support of a SPAWAR Instrumented TEMPEST Survey to validate correction of TEMPEST discrepancies scheduled and executed via the CG program office.
- ☐ Conduct of Classified Testing aboard a 123 WPB class vessel per AT procedures
- ☐ Installation of TEMPEST corrections aboard MATAGORDA.

Step 2 Installation and Test of Tempest solution for 123 Class: (30% of total withholding)

- ☐ Install design solutions to correct identified and agreed upon Instrumented TEMPEST discrepancies (from USCG Tempest Report) aboard 123 WPB class vessel in accordance with the design solution.
- ☐ Support SPAWAR's Instrumented TEMPEST Survey to validate correction of TEMPEST discrepancies.
- Install approved design solutions to correct identified and agreed upon Instrumented TEMPEST report discrepancies on the Matagorda.

Step 3 Demonstration of Tempest solution for CGC MATAGORDA prior to Matagorda OT&E: (30% of total withholding)

DEEPWATER

- Conduct of Classified Testing aboard MATAGORDA to validate classified systems are properly installed and configured for operation in an actual (non simulated) classified environment
- Conduct Classified Testing aboard a 123 WPB class vessel to validate classified C4ISR system design in an actual (non simulated) classified environment

TEMPEST re-inspections will not be required if MATAGORDA's C4ISR configuration is the same as the 123 class vessel tested in Step #2)

EXTERNAL CERTIFICATION OF CONFORMANCE

LOCKHEED MARTIN CORPORATION
MARITIME SYSTEMS & SENSORS

Page 1 of 2

It is hereby certified that the material supplied on the referenced purchase order/Contract Number fully conforms to all applicable specifications and requirements. The material supplied is in compliance with the latest ECN's / Revision noted. All material supplied under this order was originally purchased or manufactured by Lockheed Martin Maritime Systems and Sensors (MS2). All original purchasing and/or incoming inspection data is on file at MS2 and available for review upon request.

Date: 3/1/2004

Customer: Integrated Coast Guard Systems (ICGS)

Purchase Order/Contract Number: DTCG23-02-F-2DW079

P. O. Line Item Number/Level Code: N/A

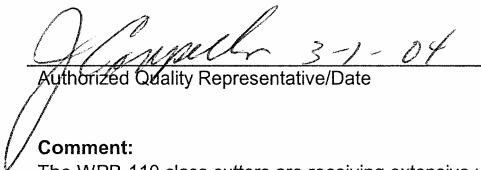
Part Revision: _____

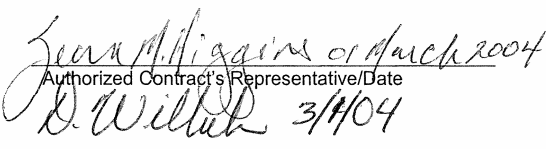
Part Number: C4ISR Equipment for CGC Matagorda -123

Part Description: C4ISR Equipment Integration, Installation, Testing & Training for the CGC Matagorda 123.

Quantity: N/A

Shipping Notice Number: N/A

 3-1-04
Authorized Quality Representative/Date

 01 March 2004
Authorized Contract's Representative/Date

Comment:

The WPB-110 class cutters are receiving extensive upgrades under the USCG Integrated Deepwater System (IDS). Aside from extending the cutter to 123' for a stern boat launch ramp and other physical/mechanical upgrades, these patrol boats are receiving Command, Control, Communication and Computer, Intelligence, Surveillance and Reconnaissance (C4ISR) upgrades.

In accordance with the C4ISR Framework Architecture, IDS CONOP and IDS Requirements, Integrated Coast Guard Systems (ICGS) is providing the following C4ISR upgrades making this asset more capable in performance its missions.

This CoC is based on completion of: Design, Installation & Testing of the C4ISR Equipment for the Matagorda. Review of system operational /verification test results were completed. On-site LM Quality surveillance performed; 100% inspection on LM cabinets assemblies 1 through 5, 100% inspection of MES equipment performed, QA checklist completed, 30% spot inspection on cable installation. Receipt of subcontractors' CoC including PROSOFT, FLIR, NGIT, & MES. Conducting training services and material to the USCG personnel. FCA & PCA audit completed. Software Version Description Document (VDD) including password and license keys transferred.

Exceptions:

SP-841

DEM 5020 (02/02/2004) DRAFT

EXTERNAL CERTIFICATION OF CONFORMANCE

LOCKHEED MARTIN CORPORATION
MARITIME SYSTEMS & SENSORS

Page 2 of 2

- 1.) PROSOFT CoC will be submitted at the completion of COP training, completion of training is dependent upon successful implementation of classified system by 3/17/04.
- 2.) Open Trial Cards EL0121001,CC0011001,CC0015001,CC0016001,CC0007001 & DC0002001.
- 3.) Submittal of C006 for final as build CBDs, CRSs, Cabinet Rack Drawings , CSEL and Software Capabilities and Limitation Document to be supplied by May 30, 2004
- 4) Delivery of C005 with section 3.2 attached, May 30, 2004.
- 5) Delivery of C005 section 3.2 requirements verification matrix, May 30, 2004.
- 6.) S016:CCM compliance analysis by May 30, 2004.
- 7.) Test Report to be submitted by March 31, 2004
- 8.) Tempest corrections in accordance with the final instrumented tempest survey report provided by the USCG, and completion of classified testing.
- 9) Delivery of L016 data input to Northrop Grumman
- 10) Delivery of I026
- 11) Submittal of low Smoke Cables request for Deviations/Waivers

Note:

USCG will provide Iridium phone; reference 123 end item P-spec negotiations.

Page 2 of 2

SMH DOW

SP-841

DEM 5020 (02/02/2004) DRAFT

U.S. Department of
Homeland Security

United States
Coast Guard



Commander
U.S. Coast Guard
Telecommunication & Information
3b)
Systems Command

Email: rporter@tiscom.uscg.mil

7323 Telegraph Road
Alexandria, VA 23115
Staff Symbol: TISCOM (isd-
3b)
Phone: 703.313.5631
Fax: 703.313.5640

2241
05 March 2004

MEMORANDUM

From: Mr. Ronald T. Porter
CG TISCOM (isd-3b)

Reply to TISCOM (isd-3b)
Attn of: Ronald T. Porter
703.313.5631

To: DIRECTOR, TISCOM Deepwater Systems

Subj: USCGC MATAGORDA VISUAL TEMPEST INSPECTION

Ref: (a) NSTISSAM TEMPEST 2-95
(b) IA PUB 5239-31 INFORMATION ASSURANCE SHIPBOARD
RED/BLACK INSTALLATION PUBLICATION

1. The Secure Electrical Information Processing System (SEIPS) on CGC MATAGORDA was inspected by Ronald Porter (TISCOM) on 19 and 21 February 2004. The inspection was conducted using criteria listed in references (a) and (b), and the SEIPS was found not to be in compliance. Discrepancies are listed in the enclosure.
2. This summary provides a record of the installation at the time of inspection. The correction of installation discrepancies is required as specified in reference (a) and (b); however, other modifications or changes to the SEIPS shall not be made without approval of Commander, TISCOM (isd-3d) or the appropriate MLC.
3. This summary and amendments to this summary shall be retained in the unit's SEIPS (TEMPEST) documentation file.

#

Enclosure: Visual Tempest Inspection Report

Copy: Maintenance and Logistics Command Atlantic (t)
Maintenance and Logistics Command Pacific (t)

Subject: Visual TEMPEST Inspection Summary

1. This Visual TEMPEST Inspection Summary is for the FTA Visit
2. The entire Secure Electrical Information Processing System was inspected.
3. List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

A. Visited space

4. Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

SF	Correction of the discrepancy is within the capability of ship's force.
IAC	Correction of the discrepancy was completed by ships force prior to completion of inspection visit.
IA	Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy.
IAC	Indicates that an industrial activity corrected the discrepancy.
SA	Indicates that the assistance of a support activity is probably required to properly correct the discrepancy.
SAC	Indicates that a support activity corrected the discrepancy.
CA	Indicates that the Contractor Activity is probably required to properly correct the discrepancy.

Column C: Reference of the paragraph in designated manuals to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

5. Discrepancy

A	B	C	Narrative
01	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2a/pg16 para 5 IA Pub 5239-31 A.1.1.1 a, b	Cabinet 3: Black RF transmitter (RT-1794) in same rack as Red Processors. Recommend moving 3 meters away or in adjacent Black Equipment Room. Explore option of putting on Bridge. If so, then distributive Key scheme may pose a problem.
02	CA	NSTISSAM TEMPEST 2/95 pg 27 Para 2a/pg16 para 5 IA Pub 5239-31 A.1.1.1 a, b	Cabinet 2: RF transmitter (PCRP 211/802) in same rack as Red Processors. Recommend moving 3 meters away or in adjacent Black Equipment Room.
03	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2b	Cabinet 3: Red processor less than one meter away from power line to black transmitter (RT-1794 p/o ARC-210)
04	CA	NSTISSAM TEMPEST 2/95 pg 27 Para 2a	Cabinet 3: Red processor less than one meter away from black signal lines connected to RF transmitter (RT-1794)
05	CA	NSTISSAM TEMPEST 2/95 pg 27 Para 4 IA PUB 5239-31 Para A.1.7.1 IA PUB 5239-31 MIL-STD 188- 124B Para 5.2.12	Signal cable used with RED processors, BLACK processors, ISDN telephones, and not terminated. Request additional information on CAT 5E cable. Red data cables for RED Lan contain questionable shielding. Manufacturer data: DARKA COMTEQ (F) ShipLan Cable 4PR 24 AWG Screened 307650. Cable contains what seems to be mylar foil. A TEMPEST hazard exists if RED cables are run with BLACK cables, or with wirelines or power lines connected to an RF transmitter. NSTISSAM 2-95. RED processors meeting the requirements of NSTISSAM TEMPEST/1-92 (Levels I, II, or III) must use optical or shielded wire cables if specified as part of the manufacturer's installation specification, or if specified for compliance with TEMPEST certification. IA Pub 5239-31: RED Shielded Metallic Wire Cable. RED metallic wire cables in all locations shall be shielded, with the exception of desktop computer cables that are provided by the manufacturer, where there is not an offered shielded cable option. This requirement is not applicable to RED fiber optic cables. B.1.2.5 (5239): Approved cables. Mil-C-17 (ref k), or MIL-C-915 (reference(l)), MIL-C-24640(reference(n)) or MIL-C-24643 (reference (o)). MIL-STD-188 "Foil shields are not acceptable for peripheral bonding and do not provide mechanical durability" IA Pub 5239-31 pg B-9 Para d. Note: "If both ends of the cable will not have the shield taken to ground, approval by the cognizant

			CTTA should be obtained prior to installation.”
06	CA	NSTISSAM TEMPEST 2/95 pg 28 Para 6	RED processors and RF transmitters in Cabinet RED processors should not be powered from the same circuits as RF transmitters.
07	CA	IA Pub 5239-31 Para B.1.2.6.16 pg B-8 and B-9	Missing pins on CRYPTO cable to KYV-5. Missing ground terminal connection on backshell.
08	CA	IA Pub 5239-31 Para B.1.2.6.16 pg B-8 and B-9	ANDVT cable has no ground terminal connection on backshell. Strain relief clamp is not on outer coating of cable. Redo connection.
09	CA	IA Pub 5239-31 Para B.1.2.6.10	AN/UPX-28 has inadequate green wire ground. Replace with Class C bond strap.
11	CA		Install ground cables per IA 5239-31. Where required, use soldered connectors vice crimping.
12	CA	IA Pub 5259-31	Remove external tooth washers on ground connectors to cabinets. Use lock washers and lug nuts per IA Instruction 5239-31 Figure B-5.
13	CA	IA Pub 5239 B.1.2.6.12	Keyboard and Monitor in Cabinet #1 has non –manufacturer supplied power cable. Bond shelf to rack.
14	CA	NSTISSAM 2-95 Para 3 Notes 3	RED/BLACK cable separation. Two inch minimum separation requirement. Six inch separation requirement for RED/BLACK cables that run in parallel for 100 ft runs. No way to physically identify RED/BLACK data cables from each other or from the ISDN phone lines.
15	CA	NSTISSAM TEMPEST 2/95 Recommendation I Pg 27	PCRP (Model 211/802) is Black transmitter in RED Cabinet #3. PCRP (RADAR) is less than three meters away from RED processing equipment. Recommend moving outside of C4ISR Classified Room.
16	CA	IA Pub 5239-31 Para B.1.2.6.10	Remove green wire grounds from CRYPTO rack and replace with Class C solid bond strap.
17	CA	IA Pub 5239-31 Para A.1.1.3	Telephone cables connected to shore tie via telephone switch cannot be routed with red cables. More info on MARCOM switch required.
18	CA	IA Pub 5239-31 Para A.1.1.7.	ARC-210 Secure voice cables. Transmit and receive audio lines need to be shielded.
19	CA		Request info on Marcom Compact IVCS Switch with PABX. Issue is port isolation for RED/BLACK connections. All ISDN phones, cellular wireless, shore connection box and KITEs have inputs to MARCOM. TISCOM TEMPEST program manager will check on configuration on SIPRNET. Wireline inputs to MARCOM in current configuration appear to be unshielded.
20	CA	NSTISSAM 2-95 Recommendation I Pg 27 Para 3 Notes: 2	Operator position in Classified C4ISR room has cables from two UNCLAS LAN and three CLASSIFIED LAN connections. Require 2 inch (5 cm) separation.

Bridge

21	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2a	Motorola VHF FM DES transceiver less than three meters from C2 Network flat panel display monitors LC 06-04-16, LC 06-04-72 and LC 06-04-84. Pending Instrumented Test.
22	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2a	Ross VHF FM transceiver less than three meters from C2 Network flat panel display monitors LC 06-04-16, LC 06-04-72 and LC 06-04-84. Pending Instrumented Test
23	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2a	Cel phone next to Secure Lan junction box less than three meters from LC 06-04-82 and LC 06-04-72. Request composition of enclosure.
24	CA	IA Pub 5239-31 Para B.1.2.6.13	No metal-to-metal contact for ground strap from ARC 210 Tray to ground on shelf. Recommend use Class C ground strap and remove paint for proper bonding.
25	CA	IA Pub 5239 A.1.1.7.2a	Not clear if Shielded Twisted Pair is used for voice and control wirelines.
26	CA	IA Pub A.1.1.7.2 Pg A-3	Unshielded cable connected to connector J3 on ARC-210 Tray. Twisted red wires (four) runs to C4ISR Cabinet #3.
27	CA	NSTISSAM TEMPEST 2/95	Wireless bridge for RHIB comms is RF transmitter?? Is this just a radio with mic on cutter?? PDAs??

Other:

28	CA	NSTISSAM 2-95 Recommendation I Pg 27 Para 3 Notes: 2	CO's cabin. RED and BLACK LAN ports have no cable separation. Recommend 2 inch separation.
29	CA	NSTISSAM 2-95 Recommendation I Pg 27 Para 1	CO's cabin. Proposed RED laptop on desk top less than 20 inches (20 cm) apart.

Cabinet #3

Derived From: NSTISSAM TEMPEST 2/95

Department of the Navy (DoN) Information Assurance (IA) Publication
Module 5239-31

MIL-STD-188-124B Grounding Bonding Shielding for Common Long
Haul/Tactical Communications Systems

PREVIOUS EDITION IS OBSOLETE.

MATERIAL INSPECTION AND RECEIVING REPORT - CONTINUATION SHEET				PAGE 2	OF 2	Form Approved OMB No. 0704-0248
Public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project (0704-0248), Washington DC 20503.						
PLEASE DO NOT RETURN YOUR COMPLETED FORM TO EITHER OF THESE ADDRESSES. SEND THIS FORM IN ACCORDANCE WITH THE INSTRUCTIONS CONTAINED IN THE DFARS, APPENDIX F-401.						
SHIPMENT NO. NA	DATE SHIPPED 20040513	PROC INSTRUMENT IDEN. (CONTRACT) DTCG23-02-C-2DW001	(ORDER) NO. 03-F-2DW196	INVOICE NO. ICGS0300-0016/ 05/13/04		
ITEM NO.	STOCK/PART NO. <i>(Indicate number of shipping containers - type of container - container number.)</i>	DESCRIPTION	QUANTITY SHIP/REC'D	UNIT	UNIT PRICE	AMOUNT
55	Continued					\$0.00
5	Tempest POA&M		1	lot	\$5,000.00	\$5,000.00
6	Classified Testing		1	lot	\$3,000.00	\$3,000.00
7	LM/MS2 C4ISR Problem Sheets/ECN/TFRs		1	lot	\$3,000.00	\$3,000.00
8	Resolution Of Non-Std WS III software image		1	lot	\$1,200.00	\$1,200.00
9	CGDN connectivity		1	ea	\$1,200.00	\$1,200.00
10	UHF paging system / FCC licence Authorization		1	lot	\$4,000.00	\$4,000.00
11	Emergent Work Requests		1		\$1,077.61	\$1,077.61
12	SRP POA&M (priced as trial card)		1		\$0.00	\$0.00
13	LIMS POA&M Execution		1		\$600.00	\$600.00
	Mod 2 yard service (de-obligate unexpended OE funds)		1		\$34,869.85	\$34,869.85
	Major Mod 110/123 (de-obligate unexpended CA funds)		1		\$185,852.51	\$185,852.51
	Amount Paid to Date		1		\$5,752,765.00	\$5,752,765.00
	Total Invoice Amount Due		1		\$1,181,807.53	\$1,181,807.53
						\$0.00
						\$0.00

DD Form 250C, NOV 92 (EG)

Previous edition may be used.

Designed using Perform Pro, WHS/DIOR, Nov 95

ICGS Certificate of Conformance:

Contract Number: DTCG23-02-C-2DW001

DTO Number: DTCG23-03-F-2DW196, CLIN 0055EA

Asset: CGC Metompkin, WPB 1323, 1 of 1

Description: This DTO provides the detailed design and construction for major modification of the 110-foot patrol boat Metompkin, including completion of all design, analyses, construction, and testing to deploy the lead vessel of the proposed 123-Ft Cutter Class, and to demonstrate compliance with requirements. Included in the modifications was an extensive ultrasonic survey of the hull was conducted resulting in the replacement of over 200 square feet of wasted hull plate; a new deckhouse providing an enlarged, 360-degree bridge and berthing for a dual-gender crew; a stern extension with a stern ramp and door for launch and recovery of the Short-Range Prosecutor; an upgraded C4ISR suite to ensure interoperability with the IDS; and all related logistics and training.

I certify that on 13 May 2004, the ICGS Deepwater Program furnished the supplies and/or services called for in accordance with all applicable requirements. I further certify that the supplies and/or services are of the quality specified and conform in all respects with the contract requirements, including specifications, drawings, preservation, packaging, packing, marking requirements, and physical item identification, and are in the quantity shown on the attached acceptance document.

Comment: This Certificate of Conformance is based upon;

- LM/MS2 Certificate of Conformance and supporting records.
- NGSS Certificate of Conformance and supporting records
- ICGS audits of LM/MS2, NG/SS, Chand, and Bollinger (BSI).
- Functional Configuration Audit and Physical Configuration Audit performed on 15 Apr 04
- 123 Cutter Certification Matrix

COMDAC INS navigation system, gyrocompass, and Radar engineering changes have been installed in the CGC Metompkin. ICGS is in receipt of Amendment of Solicitation / Modification of Contract, Modification 003, requisition/Purchase Reg. No. 24-03-2332DW196, signed by Catherine A Martindale, Contracting Officer, United States Coast Guard, Date Signed, 26 April 2004, providing USCG unilateral determination of contract value to incorporate the COMDAC INS navigation system, gyrocompass, and Radar engineering changes into the installation for the USCG 110'/123' conversion cutter METOMPKIN. ICGS reserves its right to submit a Request for Equitable Adjustment (REA) to the value associated with the contracting officer's unilateral determination.

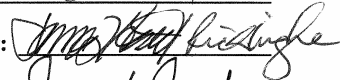
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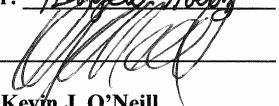
Exception(s):

- 1) Trial Cards (Attachment A)
- 2) Provisioning and Spares (Attachment B)
 - Propeller, right hand
- 3) Training for the Metompkin crew
 - Common Operating Picture (COP estimated completion 30 days after Classified System IATO)
- 4) CDRL Exceptions (Attachment C)
- 5) Tempest POA&M, (Attachment D, with Enclosure 1)
- 6) Classified Testing (Attachment D)
- 7) LM/MS2 C4ISR Problem Sheets/ECN/TFRs (Attachment E)
- 8) Resolution of Non-standard Workstation III Software image (9 June 04)
- 9) CGDN connectivity (Attachment F)
- 10) UHF paging system/FCC License Authorization (9 Jul 04)
- 11) Outstanding emergent work requests (CFRs)
 - CFR 25-2332-0029, STBD pre-lube pump starter, \$552.57
 - CFR 25-2332-0033, Fuel oil priming pump STBD main engine, \$525.04
- 12) SRP launch and retrieval system POA&M from Trial Card OH0012001 (Attachment G)
- 13) LIMS POA&M from Trial Card SP0001001, closed (Attachment H)

Date of Execution: 5/13/2004

Domain Program Manager: 

Quality Assurance Manager: 

ICGS Signature: 

Keyin J. O'Neill
Director of Contracts, ICGS LLC



Attachment D
Metompkin Tempest and Classified Testing
POA&M

Metompkin TEMPEST Issue Resolution & Classified Testing

TEMPEST Visual Inspection Discrepancy Resolution. (Holdback \$2,000)

- ICGS to resolve all visual TEMPEST discrepancies as described in the Visual Inspection report (enclosure 1) date for closure is 60 days post DD250 sign-off.

TEMPEST Hardware Discrepancy. (Holdback \$3,000)

- ICGS will correct outstanding SPAWAR instrumented TEMPEST survey hardware discrepancy on Metompkin.

Conduct Classified Testing. (Holdback \$3,000)

Conduct classified systems testing on CGC Metompkin. Target date for completion of classified testing is 15 days post USCG IATO for Metompkin. Prerequisite actions:

- ICGS to resolve all outstanding physical security discrepancies. This must be completed in order to hold the necessary classified keymat.
- ICGS to resolve all visual TEMPEST discrepancies
- Prior to performing any classified testing on a 123 WPB, the USCG must provide an IATO to allow transmit/receive of classified communications.
- ICGS will execute 123 classified tests (from AT procedures), with support as required from USCG personnel.

Visual TEMPEST Inspection Summary

The entire Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. Radio Room
2. State Rooms
3. Bridge

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

- | | |
|-----|---|
| SF | Correction of the discrepancy is within the capability of ship's force. |
| SFC | Correction of the discrepancy was completed by ships force prior to completion of inspection visit. |
| IA | Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy. |
| IAC | Indicates that an industrial activity corrected the discrepancy. |
| SA | Indicates that the assistance of a support activity is probably required to properly correct the discrepancy. |
| SAC | Indicates that a support activity corrected the discrepancy. |
| CA | Indicates that the Contractor activity is required to correct the discrepancy. |

Column C: Document Reference to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

Discrepancies and Corrective Action Report

1. Radio Room 2-28-O-Q ("TEMPEST Room")

A	B	C	Narrative
001	CA	NSTISSAM 2-95 Recommendation I, Paragraph 2.B	The printer (red) along with Classified LAN line runs parallel with IFF antenna line. There is no separation of these lines.
002	CA	IA PUB 5239-31 Paragraph B.1.2.6.2	Ground for IFF transmitter (UPX-28) needs to be cleaned. Removal of paint and dirt removed from ground.
003	CA	IA PUB 5239-31 Paragraph A.1.1.7.3.1.B	There is not a secure Protected Distribution System (PDS) leaving Radio Room. LE Locker behind Secure Space. Red cables should be in a PDS.
004	CA	IA PUB 5239-31 Paragraph A.1.1.7.2	Fabrication cables to RT-1794 are not shielded.

Note: Separation of IFF antenna line and Class LAN line may be part of an upcoming groom.

Discrepancies and Corrective Action Report

2. State Rooms 1-16-1-L / 1-16-2-L

001	CA	NSTISSAM 2-95 Rec I Paragraph 3.A	There is no separation between Classified LAN line and MF/HF line.
-----	----	-----------------------------------	--

Discrepancies and Corrective Action Report

3. Bridge

A	B	C	Narrative
001	CA	IA PUB 5239-31 Paragraph B.1.2.6.2	Ground needs to be cleaned on the Kite handset. Surface must be free of paint.
002	CA	IA PUB 5239-31 Paragraph A.1.1.7.2	ARC 210, J8 has no shielded cable.

		NSTISSAM 2-95 Para 4.4.1	
003	CA	IA PUB 5239-31 Paragraph B.1.2.6.2	There is no clean ground for the power supply 03-15-20. Surface must be free of paint and foreign material.
004	CA	IA PUB 5239-31 Paragraph B.1.2.6.2	Need to remove paint for clean ground on RCU-9310 radio.
005	CA	IA PUB 5239-31 Paragraph A.1.1.7.2	Fabricated cables to the ARC-210 are not shielded.

MATERIAL INSPECTION AND RECEIVING REPORT						Form Approved OMB No. 0704-0248	
The public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing the burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports (0704-0248), 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302. Respondents should be aware that notwithstanding any other provision of law, no person shall be subject to any penalty for failing to comply with a collection of information if it does not display a currently valid OMB control number. PLEASE DO NOT RETURN YOUR COMPLETED FORM TO THE ABOVE ADDRESS. SEND THIS FORM IN ACCORDANCE WITH THE INSTRUCTIONS CONTAINED IN THE DFARS, APPENDIX F-401.							
1. PROCUREMENT INSTRUMENT IDENTIFICATION (CONTRACT) NO. DTCG23-02-C-2DW001		ORDER NO. 03-F-2DW247		6. INVOICE NO./DATE ICGS030023 06/24/04		7. PAGE OF 1 2	
8. ACCEPTANCE POINT D		2. SHIPMENT NO. NA		3. DATE SHIPPED 24 Jun 04		4. B/L NA TCN NA	
5. DISCOUNT TERMS None		9. PRIME CONTRACTOR CODE IUYZ2 Integrated Coast Guard Systems, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209, USA		10. ADMINISTERED BY CODE Commandant (G-ACS-6) U.S. Coast Guard Deepwater SIPO, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209			
11. SHIPPED FROM (If other than 9) CODE Bollinger Shipyards Lockport, L.L.C. PO Box 250 8365 Highway 308 Lockport, LA 70374-0250		FOB:		12. PAYMENT WILL BE MADE BY CODE Commandant (G-ACS-6) U.S. Coast Guard Headquarters, 2100 Second St. SW, Room 5208, Washington, DC 20591-0001, USA			
13. SHIPPED TO CODE USCGC PADRE (WPB - 1328), C/O Coast Guard 8365 Highway 308 Lockport, LA 70374-0250		14. MARKED FOR CODE LT. Hammond					
15. ITEM NO. 0055	16. STOCK/PART NO. EB	DESCRIPTION (Indicate number of shipping containers - type of container - container number.) Services and Supplies: Padre, (thru/mod 2) WPB 123 conversion, Item short shipped of the following components: Details on Certificate of Conformance		17. QUANTITY SHIP/REC'D* 1/1	18. UNIT Lot	19. UNIT PRICE \$7,080,060.00	20. AMOUNT \$7,080,060.00
01		Trial Cards		1	Lot	\$114,850.00	\$114,850.00
02		Provisioning and Spares		1	Lot	\$35,433.50	\$35,433.50
03		Training		1	Lot	\$10,000	\$10,000.00
04		CDRL Exceptions		1	Lot	\$17,500.00	\$17,500.00
21. CONTRACT QUALITY ASSURANCE a. ORIGIN ☐ CQA ☐ ACCEPTANCE of listed items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents. DATE: _____ SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE: _____ TYPED NAME: Certificate of Conformance TITLE: _____ MAILING ADDRESS: _____ COMMERCIAL TELEPHONE NUMBER: _____				b. DESTINATION ☐ CQA ☐ ACCEPTANCE of listed items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents. DATE: _____ SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE: _____ TYPED NAME: _____ TITLE: _____ MAILING ADDRESS: _____ COMMERCIAL TELEPHONE NUMBER: _____			
22. RECEIVER'S USE Quantities shown in column 17 were received in apparent good condition except as noted. 6-24-2004  DATE RECEIVED: _____ SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE: _____ TYPED NAME: Daniel Hartinger TITLE: Contract Officer MAILING ADDRESS: U.S. Coast Guard Deepwater SIPO, 1530 Wilson Blvd., Suite 400, Arlington, VA COMMERCIAL TELEPHONE NUMBER: 571-218-3253 * If quantity received by the Government is the same as quantity shipped, indicate by (X) mark; if different, enter actual quantity received below quantity shipped and encircle.							
23. CONTRACTOR USE ONLY							

DD FORM 250, AUG 2000

PREVIOUS EDITION IS OBSOLETE.

MATERIAL INSPECTION AND RECEIVING REPORT - CONTINUATION SHEET					PAGE 2	OF 2	Form Approved OMB No. 0704-0248
Public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project (0704-0248), Washington DC 20503.							
PLEASE DO NOT RETURN YOUR COMPLETED FORM TO EITHER OF THESE ADDRESSES. SEND THIS FORM IN ACCORDANCE WITH THE INSTRUCTIONS CONTAINED IN THE DFARS, APPENDIX F-401.							
SHIPMENT NO. NA	DATE SHIPPED 20040624	PROC INSTRUMENT IDEN. (CONTRACT) DTCG23-02-C-2DW001	(ORDER) NO. 03-F-2DW247	INVOICE NO. ICGS030023 6/24/04			
ITEM NO.	STOCK/PART NO. (Indicate number of shipping containers - type of container - container number.)	DESCRIPTION	QUANTITY SHIP/REC'D	UNIT	UNIT PRICE	AMOUNT	
55	Continued					\$0.00	
5	Tempest POA&M		1	lot	\$5,000.00	\$5,000.00	
6	Classified Testing		1	lot	\$3,000.00	\$3,000.00	
7	LM/MS2 C4ISR TRFs / Problem Sheets		1	lot	\$3,000.00	\$3,000.00	
8	FCC License Authorization		1	lot	\$4,000.00	\$4,000.00	
9	SRP Launch and Retrieval POAM		1	ea	\$0.00	\$0.00	
10	LIMS POAM		1	lot	\$600.00	\$600.00	
11	Dual Service Inmarsat POAM		1		\$600.00	\$600.00	
12	IFF Cable Replacement		1		\$3,000.00	\$3,000.00	
13	P-Spec Adjustment		1		\$8,062.00	\$8,062.00	
14	Credit for Secure Comm Lock		1		-\$2,000.00	-\$2,000.00	
15	Credit for Move to New Orleans		1		-\$8,467.00	-\$8,467.00	
	0055EBB (de-obligate unexpended OE funds)		1		\$21,496.29	\$21,496.29	
	0055EBA (de-obligate unexpended CA funds)		1		\$2,803.42	\$2,803.42	
	Amount Paid to Date		1		\$5,746,348.00	\$5,746,348.00	
	Total Invoice Amount Due		1		\$1,114,834.29	\$1,114,834.29	

DD Form 250C, NOV 92 (EG)

Previous edition may be used.

Designed using Perform Pro, WHS/DIOR, Nov 95

ICGS Certificate of Conformance:

Contract Number: DTCG23-02-C-2DW001

DTO Number: DTCG23-03-F-2DW247, CLIN 0055EB

Asset: CGC Padre, WPB 1328, 1 of 1

Description: This DTO provides the detailed design and construction for major modification of the 110-foot patrol boat Padre, including completion of all design, analyses, construction, and testing to deploy the lead vessel of the proposed 123-Ft Cutter Class, and to demonstrate compliance with requirements. Included in the modifications was an extensive ultrasonic survey of the hull was conducted resulting in the replacement of over 75 square feet of wasted hull plate; a new deckhouse providing an enlarged, 360-degree bridge and berthing for a dual-gender crew; a stern extension with a stern ramp and door for launch and recovery of the Short-Range Prosecutor; an upgraded C4ISR suite to ensure interoperability with the IDS; and all related logistics and training.

I certify that on 24 June 2004, the ICGS Deepwater Program furnished the supplies and/or services called for in accordance with all applicable requirements. I further certify that the supplies and/or services are of the quality specified and conform in all respects with the contract requirements, including specifications, drawings, preservation, packaging, packing, marking requirements, and physical item identification, and are in the quantity shown on the attached acceptance document.

Comment: This Certificate of Conformance is based upon;

- LM/MS2 Certificate of Conformance and supporting records.
- NGSS Certificate of Conformance and supporting records
- ICGS audits of LM/MS2, NG/SS, Chand, and Bollinger (BSI).
- Functional Configuration Audit and Physical Configuration Audit performed on 4 June 2004
- 123 Cutter Certification Matrix

COMDAC INS navigation system, gyrocompass, and Radar engineering changes have been installed in the CGC Padre. ICGS is in receipt of Amendment of Solicitation / Modification of Contract, Modification 002, requisition/Purchase Reg. No. 24-03-2332DW247, signed by Catherine A Martindale, Contracting Officer, United States Coast Guard, Date Signed, 9 June 2004, providing USCG unilateral determination of contract value to incorporate the COMDAC INS navigation system, gyrocompass, and Radar engineering changes into the installation for the USCG 110'/123' conversion of Padre. ICGS reserves its right to submit a Request for Equitable Adjustment (REA) to the value associated with the contracting officer's unilateral determination.

www.ICGSDeepwater.com

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~~DEEPWATER~~**Exception(s):**

- 1) Trial Cards (Attachment A)
- 2) Provisioning and Spares (Attachment B)
- 3) Training for the Padre crew
 - Common Operating Picture (COP estimated completion 30 days after Classified System IATO)
- 4) CDRL Exceptions (Attachment C)
- 5) Tempest POA&M, (Attachment D, with Enclosure 1)
- 6) Classified Testing (Attachment D)
- 7) LM/MS2 C4ISR TFR/ Problem Sheets (Attachment E)
- 8) UHF paging system/FCC License Authorization (9 Jul 04)
- 9) SRP launch and retrieval system POA&M, (Attachment F)
- 10) LIMS POA&M, (Attachment G)
- 11) Dual Service INMARSAT POAM (Attachment H)
- 12) IFF Cable Replacement
- 13) P-Spec Adjustment
- 14) Credit for Secure Comm Space Lock
- 15) Credit for Move to New Orleans

Date of Execution: 24 June 04

Domain Program Manager: [Signature]

Quality Assurance Manager: [Signature]

ICGS Signature: [Signature]

Kevin J. O'Neill
Director of Contracts, ICGS LLC

Attachment D
Padre Tempest and Classified Testing
POA&M

TEMPEST Visual Inspection Discrepancy Resolution. (Holdback \$2,000)

- ICGS to resolve all visual TEMPEST discrepancies as described in the Visual Inspection report (enclosure 1) date for closure is 60 days post DD250 sign-off.

TEMPEST Hardware Discrepancy. (Holdback \$3,000)

- ICGS will correct outstanding SPAWAR instrumented TEMPEST survey hardware discrepancy on Padre.

Conduct Classified Testing. (Holdback \$3,000)

Conduct classified systems testing on CGC Padre. Target date for completion of classified testing is 15 days post USCG IATO for Padre. Prerequisite actions:

- ICGS to resolve all outstanding physical security discrepancies on the 123 to be used to execute classified testing. This must be completed in order to hold the necessary classified keymat.
- ICGS to resolve all visual TEMPEST discrepancies
- Prior to performing any classified testing on a 123 WPB, the USCG must provide an IATO to allow transmit/receive of classified communications.
- ICGS will execute 123 classified tests (from AT procedures), with support as required from USCG personnel.

Enclosure: Visual TEMPEST Inspection Summary

Enclosure 1 to Padre Tempest and Classified Testing POA&M

Visual TEMPEST Inspection Summary

The entire Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. Radio Room
2. State Rooms
3. Bridge

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

SF Correction of the discrepancy is within the capability of ship's force.

SFC Correction of the discrepancy was completed by ships force prior to completion of inspection visit.

IA Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy.

IAC Indicates that an industrial activity corrected the discrepancy.

SA Indicates that the assistance of a support activity is probably required to properly correct the discrepancy.

SAC Indicates that a support activity corrected the discrepancy.

Column C: Document Reference to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

Discrepancies and Corrective Action Report

1. Radio Room 2-28-O-Q

A	B	C	Narrative
001	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	There is no separation between Classified LAN and Unclassified LAN outlets.
002	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	Classified LAN lines are run with 120VAC power lines (no separation).
003	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	Coax TV line runs along with Classified LAN line.
004	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	There is no separation between alarm panel line and Classified LAN line.
005	IA/SA	NSTISSAM 2-95 Rec I Paragraph 2.B	The printer (red) along with Classified LAN line runs parallel with IFF antenna line. There is no separation of these lines.
006	IA/SA	IA PUB 5239-31 Paragraph A.1.1.2	The printer (red) uses black power. The printer router (red) uses black power.
007	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	There is no 3-meter separation between printer (red) and IFF transmitter.
008	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	In Rack #3, there is no 3-meter separation between red and black cables before entering the Marcom switch.

~~DEEPWATER~~

009	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	In Rack #3, there is no 3-meter separation between cryptographic equipment and RT9000 transceiver.
010	IA/SA	IA PUB 5239-31 Paragraph A.1.1.7.3.1.B	There is not a secure Protected Distribution System (PDS) leaving Radio Room. LE Locker behind Secure Space.
011	IA/SA	NSTISSAM 2-95 Paragraph 4.9.6	Cable TV system needs to use an amplifier/attenuator at the point of entry into the secure space and needs to be of a type that provides one-way filtration.

Discrepancies and Corrective Action Report

2. State Rooms 1-16-1-L / 1-16-2-L

001	IA/SA	IA PUB 5239-31 Paragraph B.1.2.6.2	There is no separation between Classified LAN outlets and 117 VAC, Unclassified LAN, and TV Jack outlets.
002	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.A	There is no separation between Classified LAN line and MF/HF line.
003	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.	In State Room 1-16-2-L, Classified LAN line runs parallel with horn generator line.

Discrepancies and Corrective Action Report

3. Bridge

A	B	C	Narrative
001	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	There is no 3meter separation between red output and black lines for the Kite handset #1 and #2.
002	IA/SA	IA PUB 5239-31 Paragraph B.1.2.6.2	Classified LAN line runs parallel with 117 VAC, Black Data lines, and cellular antenna line.

MATERIAL INSPECTION AND RECEIVING REPORT						Form Approved OMB No. 0704-0248	
The public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing the burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports (0704-0248), 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302. Respondents should be aware that notwithstanding any other provision of law, no person shall be subject to any penalty for failing to comply with a collection of information if it does not display a currently valid OMB control number. PLEASE DO NOT RETURN YOUR COMPLETED FORM TO THE ABOVE ADDRESS. SEND THIS FORM IN ACCORDANCE WITH THE INSTRUCTIONS CONTAINED IN THE DFARS, APPENDIX F-401.							
1. PROCUREMENT INSTRUMENT IDENTIFICATION (CONTRACT) NO. DTCG23-02-C-2DW001		ORDER NO. 03-F-2DW302		6. INVOICE NO./DATE ICGS030030 08/02/04		7. PAGE OF 1 2	
8. ACCEPTANCE POINT D							
2. SHIPMENT NO. NA		3. DATE SHIPPED 02 Aug 04		4. B/L NA TCN NA		5. DISCOUNT TERMS None	
9. PRIME CONTRACTOR CODE IUYZ2 Integrated Coast Guard Systems, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209, USA				10. ADMINISTERED BY CODE Commandant (G-ACS-6) U.S. Coast Guard Deepwater SIPO, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209			
11. SHIPPED FROM (If other than 9) CODE Bollinger Shipyards Lockport, L.L.C. PO Box 250 8365 Highway 308 Lockport, LA 70374-0250				12. PAYMENT WILL BE MADE BY CODE Commandant (G-ACS-6) U.S. Coast Guard Headquarters, 2100 Second St. SW, Room 5208, Washington, DC 20591-0001, USA			
13. SHIPPED TO CODE WPB - 1328 USCGC Attu (WPB - 1317), C/O Coast Guard 8365 Highway 308 Lockport, LA 70374-0250				14. MARKED FOR CODE LT. Eggert			
15. ITEM NO.		16. STOCK/PART NO. DESCRIPTION (Indicate number of shipping containers - type of container - container number.)		17. QUANTITY SHIP/REC'D*		18. UNIT	
						19. UNIT PRICE	
						20. AMOUNT	
0055 FA		Services and Supplies: Attu, (thru/mod 3) WPB 123 conversion, Item short shipped of the following components: Details on Certificate of Conformance		1/1		Lot	
01		Trial Cards		1		Lot	
02		Training		1		Lot	
03		CDRL Exceptions		1		Lot	
04		Tempest POA&M		1		Lot	
21. CONTRACT QUALITY ASSURANCE				22. RECEIVER'S USE			
a. ORIGIN ☐ CQA ☐ ACCEPTANCE of listed items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents.				b. DESTINATION ☐ CQA ☐ ACCEPTANCE of listed items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents.			
DATE _____ SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE _____ TYPED NAME: Certificate of Conformance TITLE: MAILING ADDRESS:				DATE RECEIVED: 8-3-2004 SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE: [Signature] TYPED NAME: Daniel Hartinger TITLE: Contracting Officer MAILING ADDRESS: U.S. Coast Guard Deepwater SIPO 1530 Wilson Blvd., Suite 400, Arlington, VA COMMERCIAL TELEPHONE: 571-218-3253 NUMBER:			
COMMERCIAL TELEPHONE NUMBER:				COMMERCIAL TELEPHONE NUMBER:			
23. CONTRACTOR USE ONLY							

DD FORM 250, AUG 2000

PREVIOUS EDITION IS OBSOLETE.

MATERIAL INSPECTION AND RECEIVING REPORT - CONTINUATION SHEET					PAGE 2	OF 2	Form Approved OMB No. 0704-0248
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PLEASE DO NOT RETURN YOUR COMPLETED FORM TO EITHER OF THESE ADDRESSES. SEND THIS FORM IN ACCORDANCE WITH THE INSTRUCTIONS CONTAINED IN THE DFARS, APPENDIX F-401.							
SHIPMENT NO. NA	DATE SHIPPED 20040802	PROC INSTRUMENT IDEN. (CONTRACT) DTCG23-02-C-2DW001	(ORDER) NO. 03-F-2DW302	INVOICE NO. ICGS030030 8/02/04			
ITEM NO.	STOCK/PART NO. <i>(Indicate number of shipping containers - type of container - container number.)</i>	DESCRIPTION	QUANTITY SHIP/REC'D	UNIT	UNIT PRICE	AMOUNT	
55	Continued					\$0.00	
5	Classified Testing		1	lot	\$3,000.00	\$3,000.00	
6	LM/MS2 C4ISR TRFs / Problem Sheets		1	lot	\$2,400.00	\$2,400.00	
7	FCC License Authorization		1	lot	\$4,000.00	\$4,000.00	
8	SRP Launch and Retrieval POAM		1	lot	\$0.00	\$0.00	
9	Dual Service Inmarsat POAM		1	ea	\$600.00	\$600.00	
10	P-Spec Adjustment		1	lot	\$8,062.00	\$8,062.00	
11	Credit for Secure Comm Lock		1		-\$2,000.00	-\$2,000.00	
12	Credit for Move to New Orleans		1		-\$8,467.00	-\$8,467.00	
13	Emergent Work Requests		1		\$14,200.39	\$14,200.39	
	Amount Paid to Date		1		\$5,746,168.00	\$5,746,168.00	
	Total Invoice Amount Due		1		\$1,163,168.41	\$1,163,168.41	
						\$0.00	
						\$0.00	
						\$0.00	
						\$0.00	

DD Form 250C, NOV 92 (EG)

Previous edition may be used.

Designed using Perform Pro, WHS/DIOR, Nov 95

ICGS Certificate of Conformance:

Contract Number: DTCG23-02-C-2DW001
DTO Number: DTCG23-03-F-2DW302, CLIN 0055FA
Asset: CGC ATTU, WPB 1317, 1 of 5

Description: This DTO provides the detailed design and construction for major modification of the 110-foot patrol boat Attu, including completion of all design, analyses, construction, and testing to deploy the lead vessel of the proposed 123-Ft Cutter Class, and to demonstrate compliance with requirements. Included in the modifications was an extensive ultrasonic survey of the hull was conducted resulting in the replacement of wasted hull plate; a new deckhouse providing an enlarged, 360-degree bridge and berthing for a dual-gender crew; a stern extension with a stern ramp and door for launch and recovery of the Short-Range Prosecutor; an upgraded C4ISR suite to ensure interoperability with the IDS; and all related logistics and training.

I certify that on 2 August 2004, the ICGS Deepwater Program furnished the supplies and/or services called for in accordance with all applicable requirements. I further certify that the supplies and/or services are of the quality specified and conform in all respects with the contract requirements, including specifications, drawings, preservation, packaging, packing, marking requirements, and physical item identification, and are in the quantity shown on the attached acceptance document.

Comment: This Certificate of Conformance is based upon;

- LM/MS2 Certificate of Conformance and supporting records.
- NGSS Certificate of Conformance and supporting records
- ICGS audits of LM/MS2, NG/SS, Chand, and Bollinger (BSI).
- Functional Configuration and Physical Configuration Audit performed on 29 July 2004.
- 123 Cutter Certification Matrix

COMDAC INS navigation system, gyrocompass, and Radar engineering changes have been installed in the CGC Attu. ICGS is in receipt of Amendment of Solicitation / Modification of Contract, Modification P0003, requisition/Purchase Reg. No. 24-03-2332DW302, signed by Daniel Hartinger, Contracting Officer, United States Coast Guard, Date Signed, 2 August 2004, providing USCG unilateral determination of contract value to incorporate the COMDAC INS navigation system, gyrocompass, and Radar engineering changes into the installation for the USCG 110'/123' conversion. ICGS reserves its right to submit a Request for Equitable Adjustment (REA) to the value associated with the contracting officer's unilateral determination.

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Exception(s):

- 1) Trial Cards (Attachment A)
- 2) Training for the Attu crew
 - Common Operating Picture (COP estimated completion 30 days after Classified System IATO)
- 3) CDRL Exceptions (Attachment B)
- 4) Tempest POA&M, (Attachment C, with Enclosure 1)
- 5) Classified Testing (Attachment C)
- 6) LM-MS2 C4ISR Problem Resolution Sheet (Attachment D)
- 7) FCC License Authorization (30 November 2004)
- 8) SRP launch and retrieval system POA&M, (Attachment E)
- 9) Dual Service INMARSAT POAM (Attachment F)
- 10) Performance Specification Adjustment
- 11) Credit for Secure Communications Lock
- 12) Credit for Move to New Orleans
- 13) Emergent Work Requests and Condition Found Reports (Attachment G)

Date of Execution: 2 Aug 04

Domain Program Manager: *[Signature]* / Rick Wright C4ISR

Quality Assurance Manager: *[Signature]*

ICGS Signature: *[Signature]*

Kevin J. O'Neill
Director of Contracts, ICGS LLC

Attachment A

Disputed Attu Trial Cards

Number	Title	ECD	Amount	Note
EL0001001	P25 VHF and P25 UHF not available for recording	9/3/2004	\$3,000	Issue addressed previous DD250's
EL0010001	Cable labeling throughout ship does not follow GENSPEC labeling requirements. Some cables have partial GENSPEC	9/3/2004	\$5,000	Issue addressed previous DD250's
		Disputed Attu Trial Cards	\$8,000	

Open Attu Trial Cards

Number	Title	ECD	Amount	Note
AX0001001	Fin stabilizer control head damaged. Missing knob on speed setting, missing light cover and missing bulbs.	9/3/2004	\$2,500	
AX0003001	Aft R/O water maker is inoperable.	9/3/2004	0	GA to purchase new unit
CC0003001	KITE display is incorrectly displaying ARC-210 CT/PT mode. Also, can not switch from PT to CT through KITE	9/3/2004	\$2,500	
CC0006001	KITE shows cipher when ARC-210 is in PT mode. This negatively impacts ARC-210. Also, KITE comm. to loudhailer working intermittently - ping heard but voice has been inconsistent	9/3/2004	\$1,000	
CC0007001	KITE does not switch between cipher and plain on ARC-210, so unable to verify step 5 of dockside C4ISR, Rev. "G"	9/3/2004	\$500	
CC0009001	HFDX system not verified.	9/3/2004	\$1,250	
DK0001001	Steering room bilge plates are mounted with sheets metal screws vice threaded bolt connection to facilitate repeated removal.	9/3/2004	\$1,000	
EL0002001	Pilot house security cameras are missing	9/3/2004	\$7,000	
EL0005001	IFF cables are incorrect (1 antenna)	9/3/2004	\$3,000	
EL0009001	Positive DC ground light visible in both battery chargers indicating an unsatisfactory condition	9/3/2004	\$500	
EL0012001	Tones are incorrect for general, chemical and collision alarms	9/3/2004	0	Issue addressed

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INTEGRATED COAST GUARD SYSTEMS
DEEPWATER

				previous DD250's
EL0014001	Dama/Milsatcom, Step 15 for BT event C4ISR-5a was not tested	9/3/2004	\$3,000	
EL0015001	RDF failed test (step 25BT event 4b)	9/3/2004	\$3,000	
EL0020001	CAPAC system does not operate.	9/3/2004	\$10,000	
EL0028001	Ground visible on both 24v DC panels	9/3/2004	\$1,000	
EL0029001	460 v Breaker panel #5 is tagged out.	9/3/2004	0	
EL0038001	Antennas, No rad. Haz. Signs or pel boundaries posted.	9/3/2004	\$500	
EL0046001	Steering space and lazarette two-way loudspeaker did not have two way functionality while underway. Bridge could not hear in the loud spaces	9/3/2004	\$1,000	
EL0055001	HF messenger data modem has Ethernet cables not wrapped with other cables. Terminal board wires not labeled.	9/3/2004	\$500	
MP0005001	Port and Stbd exhaust flaps not changing over, this was observed during power trials	9/3/2004	\$5,500	
MP0012001	Oil leak on aft end of STBD red gear. Leak is coming from base of hydraulic actuator	9/3/2004	\$500	
MP0013001	Stbd tachometer on EMI system not working	9/3/2004	\$500	
OH0018001	Deck plates in lazarette not secured. Are now secured with sheet metal screws	9/3/2004	\$1,500	
		Open Attu Trial Cards	\$46,250	

**Attachement B
Attu CDRL Exceptions**

ELIN #	Title	Cost to Complete	ECD
I033-01	123 WPB Test Reports	\$1,500	10/1/2004
L016	Technical Manuals	\$4,000	10/1/2004
S016	123 Cutter Certification Documents	\$10,000	10/1/2004
S025	Acceptance Trial Agenda and Certification	\$350	10/1/2004
S034	FCCS Software Update	\$500	10/1/2004
Attu CDRL Total		\$16,350	

Attachment C
Attu Tempest and Classified Testing
POA&M

TEMPEST Visual Inspection Discrepancy Resolution. (Holdback \$2,000)

- ICGS to resolve all visual TEMPEST discrepancies as described in the Visual Inspection report (enclosure 1) date for closure is 60 days post DD250 sign-off.

TEMPEST Hardware Discrepancy. (Holdback \$3,000)

- ICGS will correct outstanding SPAWAR instrumented TEMPEST survey hardware discrepancy.

Conduct Classified Testing. (Holdback \$3,000)

Conduct classified systems testing. Target date for completion of classified testing is 15 days post USCG IATO. Prerequisite actions:

- ICGS to resolve all outstanding physical security discrepancies on the 123 to be used to execute classified testing. This must be completed in order to hold the necessary classified keymat.
- ICGS to resolve all visual TEMPEST discrepancies
- Prior to performing any classified testing on a 123 WPB, the USCG must provide an IATO to allow transmit/receive of classified communications.
- ICGS will execute 123 classified tests (from AT procedures), with support as required from USCG personnel.

Enclosure: Visual TEMPEST Inspection Summary

Enclosure to Attu Tempest and Classified Testing POA&M

Visual TEMPEST Inspection Summary

The entire Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. Radio Room
2. State Rooms
3. Bridge

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

SF Correction of the discrepancy is within the capability of ship's force.

SFC Correction of the discrepancy was completed by ships force prior to completion of inspection visit.

IA Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy.

IAC Indicates that an industrial activity corrected the discrepancy.

SA Indicates that the assistance of a support activity is probably required to properly correct the discrepancy.

SAC Indicates that a support activity corrected the discrepancy.

Column C: Document Reference to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

Discrepancies and Corrective Action Report

1. Radio Room 2-28-O-Q

A	B	C	Narrative
001	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	There is no separation between Classified LAN and Unclassified LAN outlets.
002	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	Classified LAN lines are run with 120VAC power lines (no separation).
003	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	Coax TV line runs along with Classified LAN line.
004	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	There is no separation between alarm panel line and Classified LAN line.
005	IA/SA	NSTISSAM 2-95 Rec I Paragraph 2.B	The printer (red) along with Classified LAN line runs parallel with IFF antenna line. There is no separation of these lines.
006	IA/SA	IA PUB 5239-31 Paragraph A.1.1.2	The printer (red) uses black power. The printer router (red) uses black power.
007	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	There is no 3-meter separation between printer (red) and IFF transmitter.
008	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	In Rack #3, there is no 3-meter separation between red and black cables before entering the Marcom switch.

009	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	In Rack #3, there is no 3-meter separation between cryptographic equipment and RT9000 transceiver.
010	IA/SA	IA PUB 5239-31 Paragraph A.1.1.7.3.1.B	There is not a secure Protected Distribution System (PDS) leaving Radio Room. LE Locker behind Secure Space.
011	IA/SA	NSTISSAM 2-95 Paragraph 4.9.6	Cable TV system needs to use an amplifier/attenuator at the point of entry into the secure space and needs to be of a type that provides one-way filtration.

Discrepancies and Corrective Action Report

2. State Rooms 1-16-1-L / 1-16-2-L

001	IA/SA	IA PUB 5239-31 Paragraph B.1.2.6.2	There is no separation between Classified LAN outlets and 117 VAC, Unclassified LAN, and TV Jack outlets.
002	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.A	There is no separation between Classified LAN line and MF/HF line.
003	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.	In State Room 1-16-2-L, Classified LAN line runs parallel with horn generator line.

Discrepancies and Corrective Action Report

3. Bridge

A	B	C	Narrative
001	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	There is no 3meter separation between red output and black lines for the Kite handset #1 and #2.
002	IA/SA	IA PUB 5239-31 Paragraph B.1.2.6.2	Classified LAN line runs parallel with 117 VAC, Black Data lines, and cellular antenna line.

Designed using Perform Pro, WHS/DIOR, Nov 95

ICGS Certificate of Conformance:

Contract Number: DTCG23-02-C-2DW001

DTO Number: DTCG23-03-F-2DW302, CLIN 0055FA

Asset: CGC NUNIVAK, WPB 1306, 2 of 5

Description: This DTO provides the detailed design and construction for major modification of the 110-foot patrol boat Nunivak, including completion of all design, analyses, construction, and testing to deploy the vessels of the 123-Ft Cutter Class, and to demonstrate compliance with requirements. Included in the modifications was an extensive ultrasonic survey of the hull was conducted resulting in the replacement of wasted hull plate; a new deckhouse providing an enlarged, 360-degree bridge and berthing for a dual-gender crew; a stern extension with a stern ramp and door for launch and recovery of the Short-Range Prosecutor; an upgraded C4ISR suite to ensure interoperability with the IDS; and all related logistics and training.

I certify that on 14 February 2005, the ICGS Deepwater Program furnished the supplies and/or services called for in accordance with all applicable requirements. I further certify that the supplies and/or services are of the quality specified and conform in all respects with the contract requirements, including specifications, drawings, preservation, packaging, packing, marking requirements, and physical item identification, and are in the quantity shown on the attached acceptance document.

Comment: This Certificate of Conformance is based upon;

- LM/MS2 Certificate of Conformance and supporting records.
- NGSS Certificate of Conformance and supporting records
- ICGS audits of LM/MS2, NG/SS, Chand, and Bollinger (BSI).
- Functional Configuration and Physical Configuration Audit performed on 10 Feb. 2005.
- 123 Cutter Certification Matrix

Exception(s):

- 1) Trial Cards (Attachment A)
- 2) Training for the Nunivak crew
 - Common Operating Picture (COP estimated completion 30 days after Classified System IATO)
- 3) CDRL Exceptions (Attachment B)
- 4) Demonstrate C4System meets ATO requirements. (Attachment C)

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Exception(s):

- 1) Trial Cards (Attachment A)
- 2) Training for the Nunivak crew
 - Common Operating Picture (COP estimated completion 30 days after Classified System IATO)
- 3) CDRL Exceptions (Attachment B)
- 4) Demonstrate C4System meets ATO requirements.
- 5) LM-MS2 C4ISR Problem Resolution Sheet (Attachment C)
- 6) Performance Specification Adjustment

Date of Execution: 15 FEB 2005

Domain Program Manager: [Signature]

Quality Assurance Manager: [Signature]

ICGS Signature: [Signature]

Kevin J. O'Neill
Director of Contracts, ICGS LLC

G-ACS PAYMENT APPROVAL

CONTRACTOR NAME	ICGS	CONTRACT NO.	DTCG23-02-C-2DW001
INVOICE/VOUCHER NO.	ICGS030048	ORDER NUMBER	DTCG23-03-F-2DW302
INVOICE/VOUCHER AMT	\$1,004,738.50	MIPR NUMBER	N/A
DATE REC'D PROPER	3/09/05		

TYPE OF PAYMENT: ☒ INVOICE PAYMENT (Interest Penalty) ☒ CONTRACT FINANCING PAYMENT (No Interest Penalty) ☐ MIPR (Category I) PAYMENT (No Interest Penalty)

For a Contract, Order, or MIPR (Category II), select one of the following:

Fixed Price: ☐ ADVANCE ☐ PROGRESS ☒ PARTIAL ☐ FINAL ☒ OTHER DD-250
 Cost/Letter (Undefinitized): ☐ ADVANCE ☐ INTERIM ☐ FINAL
 T&M/Labor-Hour: ☐ ADVANCE ☐ INTERIM ☐ FINAL

For a MIPR (Category I), select one of the following:

Reimbursement: ☐ ADVANCE ☐ PARTIAL ☐ FINAL

Prompt Payment: ☒ 30 days ☐ Other: N/A days Discount For Prompt Payment: ☐ Days: 10 20 30
 Discount: % % % %

Assignment of Claims: ☐ Yes ☒ No ☐ No Discount

FROM: Pamela Bible, G-ACS-6, Contracting Officer 571-218-3246
 TO: USCG FINANCE CENTER, TEAM 3B, Accounts Payable Initials & Date to COTR
 VIA: LT Ben Fleming, G-D, COIR/Project Officer

FIRST ENDORSEMENT (Optional: Block 1 may serve as other written evidence in lieu of a receiving report.)

- ☒ Approve payment of Invoice/Voucher No. ICGS030048 for the amount of \$1,004,738.50
 Amount withheld: 0 (See attached justification).
☐ The supplies/services were received, inspected, and acceptance is recommended.
 Delivery Date 3/09/05 : or
☐ The supplies/services were received, inspected, and accepted.
 Delivery Date 3/09/05 Acceptance Date 3/09/05 : or
☐ The contractor's progress is commensurate with the payment requested.
- ☐ Disapprove payment of Invoice/Voucher No. for the following reasons: (See attachment).
- ☒ Charge the following accounting line(s) for payment:

Document	DAFIS Number	Accounting & Appropriation Data	Amount
Basic thru	24032332DW302	2 2 6G 099 00 0 56B200 70509 251G	\$1,004,738.50
P00009		0	
		0	
		0	

COIR/Project Officer

SECOND ENDORSEMENT

- ☒ Invoice/Voucher No. ICGS030048 is approved for payment in the amount of \$1,004,738.50 Amount withheld: 0
- After payment, the contract, order, or MIPR balance is
- Delivery Date Acceptance Date
 (Complete if not provided in First Endorsement)

Comments:

Name: Pamela Bible (571-218-3246) Date: 3/14/05
 Title: Contracting Officer

MATERIAL INSPECTION AND RECEIVING REPORT						Form Approved OMB No. 0704-0248
The public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing the burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports (0704-0248), 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302. Respondents should be aware that notwithstanding any other provision of law, no person shall be subject to any penalty for failing to comply with a collection of information if it does not display a currently valid OMB control number. PLEASE DO NOT RETURN YOUR COMPLETED FORM TO THE ABOVE ADDRESS. SEND THIS FORM IN ACCORDANCE WITH THE INSTRUCTIONS CONTAINED IN THE DFARS, APPENDIX F-401.						
1. PROCUREMENT INSTRUMENT IDENTIFICATION (CONTRACT) NO. DTCG23-02-C-2DW001		ORDER NO. 03-F-2DW302		6. INVOICE NO./DATE ICGS030048 03/07/05		7. PAGE OF 1 2
2. SHIPMENT NO. NA		3. DATE SHIPPED 09 Mar 05		4. B/L NA TCN NA		5. DISCOUNT TERMS None
9. PRIME CONTRACTOR CODE Integrated Coast Guard Systems, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209, USA				10. ADMINISTERED BY CODE Commandant (G-ACS-6) U.S. Coast Guard Deepwater SIPO, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209		
11. SHIPPED FROM (If other than 9) CODE Bollinger Shipyards Lockport, L.L.C. PO Box 250 8365 Highway 308 Lockport, LA 70374-0250				12. PAYMENT WILL BE MADE BY CODE Commandant (G-ACS-6) U.S. Coast Guard Headquarters, 2100 Second St. SW, Room 5208, Washington, DC 20591-0001, USA		
13. SHIPPED TO CODE USCGC Vashon (WPB - 1308), C/O Coast Guard 8365 Highway 308 Lockport, LA 70374-0250				14. MARKED FOR CODE COMMANDING OFFICER		
15. ITEM NO.	16. STOCK/PART NO. (Indicate number of shipping containers - type of container - container number.)	17. QUANTITY SHIP/REC'D*	18. UNIT	19. UNIT PRICE	20. AMOUNT	
0055	FA Services and Supplies: Nunivak, (thru/mod 9) WPB 123 conversion, shipset #3 Item short shipped of the following components: Details on Certificate of Conformance	1/1	Lot	\$6,866,302.00	\$6,866,302.00	
01	Trial Cards	1	Lot	\$16,750.00	\$16,750.00	
02	COP/COE Training	1	Lot	\$10,000.00	\$10,000.00	
03	CDRL Exceptions	1	Lot	\$44,000.00	\$44,000.00	
04	Demonstrate C4 system meets ATO requirements	1	Lot	\$3,000.00	\$3,000.00	
21. CONTRACT QUALITY ASSURANCE a. ORIGIN ☐ CQA ☐ ACCEPTANCE of listed Items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents. DATE: _____ SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE: _____ TYPED NAME: Certificate of Conformance TITLE: _____ MAILING ADDRESS: _____ COMMERCIAL TELEPHONE NUMBER: _____ b. DESTINATION ☐ CQA ☐ ACCEPTANCE of listed Items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents. DATE: _____ SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE: _____ TYPED NAME: _____ TITLE: _____ MAILING ADDRESS: _____ COMMERCIAL TELEPHONE NUMBER: _____						
22. RECEIVER'S USE Quantities shown in column 17 were received in apparent good condition except as noted. DATE RECEIVED: 3/9/05 SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE: <i>[Signature]</i> TYPED NAME: Pamela Bible TITLE: Contracting Officer MAILING ADDRESS: U.S. Coast Guard Deepwater SIPO 1530 Wilson Blvd., Suite 400, Arlington, VA COMMERCIAL TELEPHONE: 571-218-3246 NUMBER: _____ * If quantity received by the Government is the same as quantity shipped, indicate by (X) mark; if different, enter actual quantity received below quantity shipped and encircle.						
23. CONTRACTOR USE ONLY						

DD FORM 250, AUG 2000

PREVIOUS EDITION IS OBSOLETE.

ICGS Certificate of Conformance:

Contract Number: DTCG23-02-C-2DW001

DTO Number: DTCG23-03-F-2DW302, CLIN 0055FA

Asset: CGC VASHON, WPB 1308, 3 of 5

Description: This DTO provides the detailed design and construction for major modification of the 110-foot patrol boat Vashon, including completion of all design, analyses, construction, and testing to deploy the vessels of the 123-Ft Cutter Class, and to demonstrate compliance with requirements. Included in the modifications was an extensive ultrasonic survey of the hull was conducted resulting in the replacement of wasted hull plate; a new deckhouse providing an enlarged, 360-degree bridge and berthing for a dual-gender crew; a stern extension with a stern ramp and door for launch and recovery of the Short-Range Prosecutor; an upgraded C4ISR suite to ensure interoperability with the IDS; and all related logistics and training.

I certify that on 09 March 2005, the ICGS Deepwater Program furnished the supplies and/or services called for in accordance with all applicable requirements. I further certify that the supplies and/or services are of the quality specified and conform in all respects with the contract requirements, including specifications, drawings, preservation, packaging, packing, marking requirements, and physical item identification, and are in the quantity shown on the attached acceptance document.

Comment: This Certificate of Conformance is based upon;

- LM/MS2 Certificate of Conformance and supporting records.
- NGSS Certificate of Conformance and supporting records
- ICGS audits of LM/MS2, NG/SS, Chand, and Bollinger (BSI).
- Functional Configuration and Physical Configuration Audit performed on 02 Mar. 2005.
- 123 Cutter Certification Matrix

Exception(s):

- 1) Trial Cards (Attachment A)
- 2) Training for the Vashon crew
 - Common Operating Picture (COP estimated completion 30 days after Classified System IATO)
- 3) CDRL Exceptions (Attachment B)
- 4) Demonstrate C4System meets ATO requirements.

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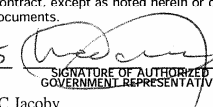
- 5) Insurance spares, Right Hand Propeller
- 6) Performance Specification Adjustment

Date of Execution: 9 Mar 05

Domain Program Manager: *[Signature]*

Quality Assurance Manager: *[Signature]*

ICGS Signature: *[Signature]*
Kevin J. O'Neill
Director of Contracts, ICGS LLC

MATERIAL INSPECTION AND RECEIVING REPORT						Form Approved OMB No. 0704-0248	
The public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing the burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports (0704-0248), 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302. Respondents should be aware that notwithstanding any other provision of law, no person shall be subject to any penalty for failing to comply with a collection of information if it does not display a currently valid OMB control number. PLEASE DO NOT RETURN YOUR COMPLETED FORM TO THE ABOVE ADDRESS. SEND THIS FORM IN ACCORDANCE WITH THE INSTRUCTIONS CONTAINED IN THE DFARS, APPENDIX F-401.							
1. PROCUREMENT INSTRUMENT IDENTIFICATION (CONTRACT) NO. DTCG23-02-C-2DW001		ORDER NO. 03-F-2DW302		6. INVOICE NO./DATE ICGS0300102 10/03/05		7. PAGE OF 1 2	
8. ACCEPTANCE POINT D		2. SHIPMENT NO. NA		3. DATE SHIPPED 03 Oct 05		4. B/L NA TCN NA	
5. DISCOUNT TERMS None		9. PRIME CONTRACTOR CODE IUYZ2		10. ADMINISTERED BY CODE Commandant (G-ACS-6) U.S. Coast Guard Deepwater SIPO, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209			
11. SHIPPED FROM (If other than 9) CODE Bollinger Shipyards Lockport, L.L.C. PO Box 250 8365 Highway 308 Lockport, LA 70374-0250		12. PAYMENT WILL BE MADE BY CODE Commandant (G-ACS-6) U.S. Coast Guard Headquarters, 2100 Second St. SW, Room 5208, Washington, DC 20591-0001, USA		13. SHIPPED TO CODE WPB - 1305 USCGC Monhegan (WPB - 1305), C/O Coast Guard 8365 Highway 308 Lockport, LA 70374-0250			
14. MARKED FOR CODE COMMANDING OFFICER		15. ITEM NO. 16. STOCK/PART NO. DESCRIPTION (Indicate number of shipping containers - type of container - container number.)					
17. QUANTITY SHIP/REC'D*		18. UNIT		19. UNIT PRICE		20. AMOUNT	
0055		FA		Services and Supplies: Monhegan, (thru/mod 9) WPB 123 conversion, shipset #7 Item short shipped of the following components: Details on Certificate of Conformance		1/1 Lot \$6,760,196.80 \$6,760,196.80	
01		01		Bridge Group Discrepancies		1 Lot \$139,500.00 \$139,500.00	
02		02		Technical Data		1 Lot \$150,000.00 \$150,000.00	
03		03		Power Group Discrepancies		1 Lot \$150,000.00 \$150,000.00	
04		04		COP Training		1 Lot \$10,000.00 \$10,000.00	
21. CONTRACT QUALITY ASSURANCE				22. RECEIVER'S USE			
a. ORIGIN ☐ CQA ☐ ACCEPTANCE of listed items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents. DATE: _____ SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE: _____ TYPED NAME: Certificate of Conformance TITLE: _____ MAILING ADDRESS: _____ COMMERCIAL TELEPHONE NUMBER: _____				b. DESTINATION ☐ CQA ☒ ACCEPTANCE of listed items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents. DATE: 04 OCT 05 SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE:  TYPED NAME: C Jacoby TITLE: PM MAILING ADDRESS: _____ COMMERCIAL TELEPHONE NUMBER: _____			
23. CONTRACTOR USE ONLY				Quantities shown in column 17 were received in apparent good condition except as noted. DATE RECEIVED: 10/4/2005 SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE:  TYPED NAME: Dan Hartinger TITLE: Contracting Officer MAILING ADDRESS: U.S. Coast Guard Deepwater SIPO, 1530 Wilson Blvd., Suite 400, Arlington, VA COMMERCIAL TELEPHONE NUMBER: 571-218-3253 * If quantity received by the Government is the same as quantity shipped, indicate by (X) mark; if different, enter actual quantity received below quantity shipped and encircle.			

DD FORM 250, AUG 2000

PREVIOUS EDITION IS OBSOLETE.

MATERIAL INSPECTION AND RECEIVING REPORT - CONTINUATION SHEET					PAGE 2	OF 2	Form Approved OMB No. 0704-0248
Public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302, and to the Office of Management and Budget, Paperwork Reduction Project (0704-0248), Washington DC 20503. PLEASE DO NOT RETURN YOUR COMPLETED FORM TO EITHER OF THESE ADDRESSES. SEND THIS FORM IN ACCORDANCE WITH THE INSTRUCTIONS CONTAINED IN THE DFARS, APPENDIX F-401.							
SHIPMENT NO. NA	DATE SHIPPED 20051003	PROC INSTRUMENT IDEN. (CONTRACT) DTCG23-02-C-2DW001	(ORDER) NO. 03-F-2DW302	INVOICE NO. ICGS030102 10/03/05			
ITEM NO.	STOCK/PART NO. (Indicate number of shipping containers - type of container - container number.)	DESCRIPTION	QUANTITY SHIP/REC'D	UNIT	UNIT PRICE	AMOUNT	
		Continued, Monhegan WPB-1305				\$0.00	
5		SRP Training	1	lot	\$3,000.00	\$3,000.00	
6		ARC 210 Training	1	lot	\$1,000.00	\$1,000.00	
7		AS-Built Drawings	1	lot	\$15,000.00	\$15,000.00	
8		Selected Record Drawings	1	lot	\$5,000.00	\$5,000.00	
9		Cutter Specification Certification Documentation	1	lot	\$5,000.00	\$5,000.00	
10		C4 Demonstration	1	lot	\$3,000.00	\$3,000.00	
11		De-Ratting Certificate	1	lot	\$500.00	\$500.00	
12		Cable Labels	1	lot	\$5,000.00	\$5,000.00	
13		P-Spec Adjustment	1	lot	\$8,062.00	\$8,062.00	
		Amount Paid to Date	1		\$5,746,168.00	\$5,746,168.00	
		Total Invoice Amount Due	1		\$518,966.80	\$518,966.80	
						\$0.00	
						\$0.00	
						\$0.00	
						\$0.00	

DD Form 250C, NOV 92 (EG)

Previous edition may be used.

Designed using Perform Pro, WHS/DIOR, Nov 95

ICGS Certificate of Conformance:

Contract Number: DTCG23-02-C-2DW001

DTO Number: DTCG23-03-F-2DW302, CLIN 0055FA

Asset: CGC Monhegan, WPB 1305, 4 of 5

Description: This DTO provides the detailed design and construction for major modification of the 110-foot patrol boat Monhegan, including completion of all design, analyses, construction, and testing to deploy the vessels of the 123-Ft Cutter Class, and to demonstrate compliance with requirements. Included in the modifications was an extensive ultrasonic survey of the hull was conducted resulting in the replacement of wasted hull plate; a new deckhouse providing an enlarged, 360-degree bridge and berthing for a dual-gender crew; a stern extension with a stern ramp and door for launch and recovery of the Short-Range Prosecutor; an upgraded C4ISR suite to ensure interoperability with the IDS; and all related logistics and training.

I certify that on 3 October 2005, the ICGS Deepwater Program furnished the supplies and/or services called for in accordance with all applicable requirements. I further certify that the supplies and/or services are of the quality specified and conform in all respects with the contract requirements, including specifications, drawings, preservation, packaging, packing, marking requirements, and physical item identification, and are in the quantity shown on the attached acceptance document.

Comment: This Certificate of Conformance is based upon;

- LM/MS2 Certificate of Conformance and supporting records.
- NGSS Certificate of Conformance and supporting records
- ICGS audits of LM/MS2, NG/SS, Chand, and Bollinger (BSI).

Exception(s):

- 1) Bridge Group Discrepancies (Attachment A)
- 2) Technical Manuals, Updated FCCS, and Stability Booklet (L018 & S034)
- 3) Power Group Discrepancies (Attachment B)
- 4) Common Operating Picture Training (COP estimated completion 30 days after Classified System IATO)
- 5) SRP Operational Training (estimated completion 30 days after delivery)
- 6) ARC-210 Operational Training (estimated completion 30 days after delivery)
- 7) As Built Drawings (S037)

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INTEGRATED COAST GUARD SYSTEMS
DEEPWATER

- 6) ARC-210 Operational Training (estimated completion 30 days after delivery)
- 7) As Built Drawings (S037)
- 8) Selected Records Drawings (S038)
- 9) Cutter Specification Certification Documentation (S016)
- 10) Demonstrate C4 Meets ATO Requirements
- 11) De-ratting Certificate
- 12) Cable Lables
- 13) P-Spec Adjustment

Date of Execution: 3 Oct 05

Quality Assurance Manager: Rckub

Finance/Business Manager: James M. Atkinson

Domain Program Manager: for J. J. J. J.

ICGS Signature: [Signature]

Kevin J. O'Neill
Director of Contracts, ICGS LLC



Northrop Grumman Corporation
Ship Systems
Avondale Operations
P. O. Box 50280
New Orleans, LA 70150-0280

NGSS Certificate of Conformance:

Contract Number: DTCG23-02-C-2DW001
DTO Number: DTCG23-03-F-2DW302, CLIN 0055FA
Asset: CGC MONHEGAN, WPB 1305, 4 of 5

Description: This DTO provides the construction for major modification of the 110-foot patrol boat Monhegan, including completion of all construction, and testing to deploy the vessel and to demonstrate compliance with requirements. Included in the modifications was an ultrasonic survey of the hull which resulted in the replacement of portions of the hull plate; a new deckhouse providing an enlarged, 360-degree bridge and berthing for a dual-gender crew; a stem extension with a stem ramp and door for launch and recovery of the Short-Range Prosecutor; an upgraded C4ISR suite to ensure interoperability with the IDS; and all related logistics and training.

I certify that on 3 October 2005, the ICGS Deepwater Program furnished the supplies and/or services called for in accordance with all applicable requirements. I further certify that the supplies and/or services are of the quality specified and conform in all respects with the contract requirements, including specifications, drawings, preservation, packaging, packing, marking requirements, and physical item identification, and are in the quantity shown on the attached acceptance document.

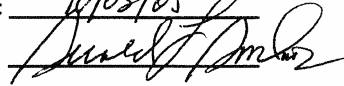
Comment: This Certificate of Conformance is based upon;

- Bollinger Shipyards Certificate of Conformance
- NGSS Q.A. Source Inspections
- Functional Configuration Audit and Physical Configuration Audit completed April 2005
- 123 Cutter Certification Matrix

Exception(s):

- 1) Monhegan - Attachment A, Trial Cards
- 2) Monhegan- Attachment B, Training for the Crew
- 3) Monhegan- Attachment C, CDRL's
- 4) Monhegan- Attachment D, Open Items not Trial Cards

Date of Execution: 10/03/05

* Signature: 

Gerald Good

* In my opinion, SO29, Detaining Cert should not be withheld. The Gov. is not issuing certs to the New Orleans area.

EXTERNAL CERTIFICATION OF CONFORMANCE

LOCKHEED MARTIN CORPORATION
MARITIME SYSTEMS & SENSORS

Page 1 of 2

It is hereby certified that the material supplied on the referenced purchase order/Contract Number fully conforms to all applicable specifications and requirements. The material supplied is in compliance with the latest ECN's / Revision noted. All material supplied under this order was originally purchased or manufactured by Lockheed Martin Maritime Systems and Sensors (MS2). All original purchasing and/or incoming inspection data is on file at MS2 and available for review upon request.

Date: 10/3/2004 (Delivery 10/3/2005)
Customer: Integrated Coast Guard Systems (ICGS)
Purchase Order/Contract Number: DTCG23-03-F-2DW302 (CLIN 0055FA)
P. O. Line Item Number/Level Code: N/A
Part Revision: _____
Part Number: C4ISR Equipment for CGC MONHEGAN -123
Part Description: C4ISR Equipment Integration, Installation, Testing & Training for the CGC MONHEGAN -123.
Quantity: N/A
Shipping Notice Number: N/A

J. Griscom

Authorized Quality Representative/Date 10/3/05

Sean Higgins

Authorized Contract's Representative/Date 10/3/05

SP-841

DEM 5020 (02/02/2004)

EXTERNAL CERTIFICATION OF CONFORMANCE

LOCKHEED MARTIN CORPORATION
MARITIME SYSTEMS & SENSORS

Page 2 of 2

Comment:

The WPB-110 class cutters are receiving extensive upgrades under the USCG Integrated Deepwater System (IDS). Aside from extending the cutter to 123' for a stern boat launch ramp and other physical/mechanical upgrades, these patrol boats are receiving Command, Control, Communication and Computer, Intelligence, Surveillance and Reconnaissance (C4ISR) upgrades. In accordance with the C4ISR Framework Architecture, IDS CONOP and IDS Requirements, Integrated Coast Guard Systems (ICGS) is providing the following C4ISR upgrades making this asset more capable in performance its missions.

This CoC is based on completion of (unless noted in exceptions):

- Design, Installation & Testing of the C4ISR Equipment.
- Review of system operational /verification test results were completed.
- On-site LM Quality surveillance performed; 100% inspection on LM cabinet assemblies 1 through 5, inspection of MES equipment performed & QA checklist completed.
- Receipt of subcontractors' CoC including PROSOFT, FLIR, & MES.
- Conducting training services and material to the USCG personnel.
- Functional & Physical assessments completed.
- Software Version Description Document (VDD) including password and license keys transferred.

Exceptions:

1) SUBCONTRACTOR CoCs:

- 1a) NGIT CoC.
- 1b) LM IS&S CoC.

2) OPEN TRIAL CARDS:

- | | |
|----------------------|-------------------------------|
| 2a) 1305ATCC0007 001 | BT Event C4ISR Steps not Demo |
| 2b) 1305ATCC0022 001 | PA Speaker |
| 2c) 1305ATEL0003 001 | 24V Power Panel |
| 2d) 1305ATEL0008 001 | Cable Labels |
| 2e) 1305ATEL0046 001 | AIS Term Box |
| 2f) 1305ATEL0050 001 | Bridge Console Cable Labels |

3) LIMS Connectivity Test to be completed at ESU in New Orleans, LA.

4) Cable Tag RFD: Cable labeling remains an open issue. RFD is approved.

5) Conduct classified testing.

6) Conduct ARC-210 Training

7) Conduct Common Operating Picture (COP) training

8) Submit CDRL (L016) Technical Manual

Notes:

1. USCG will provide Iridium phone; reference 123 end item P-spec negotiations.

2. Lockheed Martin Maritime Systems & Sensors has submitted a proposal for the incorporation of COMDAC on the MONHEGAN. It is expected the parties will negotiate the price and terms associated with this added scope and will formally incorporate this effort into the contract via supplemental agreement.

SP-841

DEM 5020 (02/02/2004)

ICGS Certificate of Conformance:

Contract Number: DTCG23-02-C-2DW001
DTO Number: DTCG23-03-F-2DW302, CLIN 0055FA
Asset: CGC Manitou, WPB 1302, 5 of 5

Description: This DTO provides the detailed design and construction for major modification of the 110-foot patrol boat Manitou, including completion of all design, analyses, construction, and testing to deploy the vessels of the 123-Ft Cutter Class, and to demonstrate compliance with requirements. Included in the modifications was an extensive ultrasonic survey of the hull was conducted resulting in the replacement of wasted hull plate; a new deckhouse providing an enlarged, 360-degree bridge and berthing for a dual-gender crew; a stern extension with a stern ramp and door for launch and recovery of the Short-Range Prosecutor; an upgraded C4ISR suite to ensure interoperability with the IDS; and all related logistics and training.

I certify that on 13 January 2006, the ICGS Deepwater Program furnished the supplies and/or services called for in accordance with all applicable requirements. I further certify that the supplies and/or services are of the quality specified and conform in all respects with the contract requirements, including specifications, drawings, preservation, packaging, packing, marking requirements, and physical item identification, and are in the quantity shown on the attached acceptance document.

Comment: This Certificate of Conformance is based upon;

- LM/MS2 Certificate of Conformance and supporting records.
- NGSS Certificate of Conformance and supporting records
- ICGS audits of LM/MS2, NG/SS, Chand, and Bollinger (BSI).
- Physical Configuration Audit.
- 123 Cutter Certification Matrix

Exception(s):

- 1) Bridge Group Discrepancies (Attachment A)
- 2) Power Group Discrepancies (Attachment B)
- 3) Trial Cards, general (Attachment C)
- 4) Common Operating Picture Training (COP estimated completion 30 days after Classified System IATO)
- 5) CDRL Items (Attachment D)

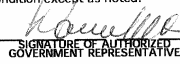
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INTEGRATED COAST GUARD SYSTEMS
DEEPWATER

- 6) Demonstrate C4 System meets ATO Requirements
- 7) P-Spec Adjustment
- 8) CLIN 055FA Closeout (Attachment E)

Date of Execution: 13 Jan 2006
Quality Assurance Manager: Rachuba
Finance/Business Manager: Walters 1/13/06
Domain Program Manager: for J. Salas
ICGS Signature: for Kevin J. O'Neill
Kevin J. O'Neill
Director of Contracts, ICGS LLC

MATERIAL INSPECTION AND RECEIVING REPORT						Form Approved OMB No. 0704-0248	
The public reporting burden for this collection of information is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing the burden, to Department of Defense, Washington Headquarters Services, Directorate for Information Operations and Reports (0704-0248), 1215 Jefferson Davis Highway, Suite 1204, Arlington, VA 22202-4302. Respondents should be aware that notwithstanding any other provision of law, no person shall be subject to any penalty for failing to furnish a collection of information if it does not display a currently valid OMB control number. PLEASE DO NOT RETURN YOUR COMPLETED FORM TO THE ABOVE ADDRESS. SEND THIS FORM IN ACCORDANCE WITH THE INSTRUCTIONS CONTAINED IN THE DFARS, APPENDIX F-401.							
1. PROCUREMENT INSTRUMENT IDENTIFICATION (CONTRACT) NO. DTCG23-02-C-2DW001		ORDER NO. 03-F-2DW302		6. INVOICE NO./DATE ICGS0300136 01/13/06		7. PAGE OF 1 2	
2. SHIPMENT NO. NA		3. DATE SHIPPED 13 Jan 06		4. B/L NA TCN NA		5. DISCOUNT TERMS None	
9. PRIME CONTRACTOR CODE Integrated Coast Guard Systems, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209, USA				10. ADMINISTERED BY CODE Commandant (G-ACS-6) U.S. Coast Guard Deepwater SIPO, 1530 Wilson Blvd., Suite 400, Arlington, VA 22209			
11. SHIPPED FROM (If other than 9) CODE Bollinger Shipyards Lockport, L.L.C. PO Box 250 8365 Highway 308 Lockport, LA 70374-0250				12. PAYMENT WILL BE MADE BY CODE Commandant (G-ACS-6) U.S. Coast Guard Headquarters, 2100 Second St. SW, Room 5208, Washington, DC 20591-0001, USA			
13. SHIPPED TO CODE USCGC Manitou (WPB - 1302), C/O Coast Guard 8365 Highway 308 Lockport, LA 70374-0250				14. MARKED FOR CODE COMMANDING OFFICER			
15. ITEM NO.	16. STOCK/PART NO. (Indicate number of shipping containers - type of container - container number.)	17. QUANTITY SHIP/REC'D*	18. UNIT	19. UNIT PRICE	20. AMOUNT		
0055	FA Services and Supplies: Manitou, (thru/mod 16) WPB 123 conversion with dry-dock package, shipset #8 Item short shipped of the following components: Details on Certificate of Conformance	1/1	Lot	\$7,719,003.80	\$7,719,003.80		
01	Bridge Group Discrepancies	1	Lot	\$150,000.00	\$150,000.00		
02	Power Group Discrepancies	1	Lot	\$150,000.00	\$150,000.00		
03	Trial Cards, General	1	Lot	\$150,000.00	\$150,000.00		
04	COP/COE Training	1	Lot	\$10,000.00	\$10,000.00		
21. CONTRACT QUALITY ASSURANCE				22. RECEIVER'S USE			
a. ORIGIN ☐ CQA ☐ ACCEPTANCE of listed items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents.				b. DESTINATION ☐ CQA ☐ ACCEPTANCE of listed items has been made by me or under my supervision and they conform to contract, except as noted herein or on supporting documents.			
DATE _____ SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE _____ TYPED NAME: Certificate of Conformance TITLE: _____ MAILING ADDRESS: _____ COMMERCIAL TELEPHONE NUMBER: _____				DATE RECEIVED: 13 Jan 06 SIGNATURE OF AUTHORIZED GOVERNMENT REPRESENTATIVE:  TYPED NAME: Pam Bible TITLE: Contracting Officer MAILING ADDRESS: U.S. Coast Guard Deepwater SIPO, 1530 Wilson Blvd., Suite 400, Arlington, VA COMMERCIAL TELEPHONE NUMBER: 571-218-3246			
23. CONTRACTOR USE ONLY				* If quantity received by the Government is the same as quantity shipped, indicate by (X) mark; if different, enter actual quantity received below quantity shipped and encircle.			

DD FORM 250, AUG 2000

PREVIOUS EDITION IS OBSOLETE.



DEPARTMENT OF THE NAVY
COMMANDER OPERATIONAL TEST AND EVALUATION FORCE
7970 DIVEN STREET
NORFOLK, VIRGINIA 23505-1498

3980
Ser 76/2443

APR 27 2005

From: Commander, Operational Test and Evaluation Force
To: Commandant, United States Coast Guard

Subj: UPDATE OF THE 123-FOOT PATROL BOAT (123' WPB)
OPERATIONAL ASSESSMENT ANALYSIS (OAA) OF 29 SEP 04

Ref: (a) COMDT COGARD WASHINGTON DC 101705Z Mar 05
(b) COMOPTEVFOR ltr 3980 Ser 76/580 of 29 Sep 04
(c) COMOPTEVFOR ltr 3980 Ser 91/494 of 18 Jul 03

Encl: (1) OAA Update Matrix and Comments

1. **PURPOSE.** Reference (a) requested COMOPTEVFOR to provide an update to the 123' WPB upgrade OAA report (reference (b)).

CAVEAT: This observation does not constitute a formal phase of operational testing (OT), but rather a demonstration in which OT testers are actively involved, providing operational perspective and gaining valuable hands-on familiarity with the system. Data and findings from this observation may be used to supplement formal OT data, provided certain criteria are met. This observation does not resolve critical operational issues (COI) and does not reach conclusions regarding effectiveness or suitability.

2. **BACKGROUND.** COMOPTEVFOR conducted a review and update of the 123' WPB Upgrade OAA, including the supporting command, control, communications, computers, intelligence, surveillance and reconnaissance (C4ISR) and Logistics Information Management System (LIMS) as they applied to both the cutter and the supporting operational and maintenance organizations. Observations were conducted in cutters MATAGORDA, METOMPKIN, PADRE, and NUNIVAK at U.S. Coast Guard Sector Key West and included observations at all immediate supporting organizations. This update period was not planned or coordinated by a program test and evaluation master plan and was not part of the 123' WPB OAA test plan (reference (c)). A separate test plan was not developed for this update. A review of the significant risks and associated recommendations provided in reference (b) was conducted and will provide the Deepwater program with current operational assessment of those significant risks to operational effectiveness and suitability, whose associated recommendations should be implemented prior to operational evaluation (OPEVAL).

Subj: UPDATE OF THE 123-FOOT PATROL BOAT (123' WPB)
 OPERATIONAL ASSESSMENT ANALYSIS OF 29 SEP 04

3. RISK SUMMARY. The following table depicts the current level of risk assessed to be associated with the successful resolution of COIs prior to OPEVAL. Risk assessment is based upon a comparison of previously reported risks with 123' WPB and associated support system program improvements since completion of the OAA.

COI Assessments	OAA (9/29/04)	OAA Update (4/29/05)	Note
Surveillance, Detection, Classification, Identification and Prosecution (SDCIP)			
Tactics			
Survivability			
Joint Interoperability	White		1
Connectivity			
Information Assurance (IA)			2
Electromagnetic Environmental Effects (E ³)			3
Reliability			
Maintainability			4
Availability			
Logistic Supportability			
Compatibility			5
Interoperability			
Training			
Human Factors			
Safety			
Documentation			6
Color codes for OAAs are:  - High level of risk identified.  - Moderate level of risk identified.  - Little or no risk identified. White - Not evaluated or assessed as a result of system immaturity or lack of information.			
Notes: 1 Risk increase due to C4ISR system displaying no improvement in obtaining interface with other service/agency systems. There was no capability for track input, sharing, or for email/chat. 2 Risk increase due to decertification of the capability of the C4ISR installation to meet IA requirements on any cutters. 3 Risk mitigation due to TEMPEST certification and continuing resolution of identified discrepancies. 4 Risk increase due to insufficient progress on developing or updating training and certification programs, operating manuals, technical manuals, maintenance procedures, etc. 5 Although outside the scope of this assessment, it appears that the modifications to the 123' WPB may have contributed to the degradation of the structural integrity of the hull and overall compatibility with the operating environment. 6 Risk increase due to continued lack of operational and maintenance documentation despite significant program experience and cutter delivery.			

Subj: UPDATE OF THE 123-FOOT PATROL BOAT (123' WPB)
OPERATIONAL ASSESSMENT ANALYSIS OF 29 SEP 04

4. RISK UPDATE COMMENTS. Enclosure (1) provides recommendations from reference (b) and the associated risks that provided the foundation for those initial recommendations. The last column of enclosure (1) provides comments resulting from this update period.

5. SIGNIFICANT OBSERVATIONS

a. 123' WPB

(1) Command and Control (C2). The C2 equipment and associated software packages provided with the modification have not demonstrated the capability to generate a local tactical picture (LTP), contribute to a collective tactical picture, or receive the Atlantic Area managed common operational picture (COP). Interoperability on classified voice circuits was limited to USCG shore stations, cutters, and aircraft. The C4ISR system was not working as designed and the systems were not capable of operating or maintaining a basic capability in accordance with the CONOPS.

(2) LIMS. The LIMS logistics system (including both the ELLIPSE in-port functionality and the Fleet Logistics Management System (FLMS) underway) has had a negative impact on the maintenance and supply functions of the cutters. Of the twelve projected "iteration zero" capabilities, eleven have not yet been provided.

(3) Short Range Prosecutor (SRP) Recovery. SRP recovery evolutions in higher sea states are being conducted without proven or validated procedures and have the potential to be done at levels of risk beyond what is acceptable for personnel and equipment safety. Decrease in communications capability of the SRP and resulting degradation of C2 between the cutter and the SRP impact operational effectiveness and safety during recovery operations.

(4) Documentation. LIMS operating manuals, C4ISR system technical and operating manuals, training and personal qualification program documentation, towing and SRP recovery equipment certifications, and system operating procedures were either not provided or are incomplete.

(5) Situational Awareness. Various new installations on the cutters provided improvements individually. As a collection of standalone capabilities, they included the digital global positioning system, automated identification system, and the infrared camera system. The crews were able to combine some of the individual outputs of

Subj: UPDATE OF THE 123-FOOT PATROL BOAT (123' WPB)
OPERATIONAL ASSESSMENT ANALYSIS OF 29 SEP 04

these equipments and obtain an increased situational awareness during patrols. These equipments were not integrated and were not capable of contributing to a networked tactical picture.

b. The following observations and recommendations are deemed significant beyond the 123' WPB upgrade in that the associated risks may impact other Deepwater program assets, C4ISR and logistics domains, or the Integrated Deepwater System overall.

(1) LIMS/ELLIPSE/FLMS lack of functionality and increased level of effort is currently isolated to the cutters in Sector Key West. The capability to deal with the deficiencies of the system is only possible as a result of tremendous effort by the ICGS on site representative and the District and Sector maintenance organizations. Extension of the LIMS program in its current state to other USCG locations should be carefully considered pending a near complete development and validation of LIMS capability and functionality.

(2) The C4ISR equipment and software installed in the 123' WPB are initial production iteration installations for all subsequent Deepwater program assets. The inability to generate a LTP and to contribute to the COP or to receive and display the COP need to be resolved by equipment/software upgrades, improved maintenance capability, and better training.

(3) The SRP recovery system in the 123' WPB serves as a bellwether for future design and installations in the national security cutter, offshore patrol cutter, and the fast response cutter. The critical equipment and safe and effective procedures for conducting astern recoveries in higher sea states for both the SRP and the long range interceptor should be developed and proven by an effective and integrated test and evaluation process prior to continued program development.

6. **RECOMMENDATIONS.** Within the scope of this assessment, I recommend formal and documented validation of correction of deficiencies be conducted for those risks identified in reference (a) prior to conducting the operational test readiness review for OPEVAL. If the major effectiveness and suitability risks associated with the 123' WPB modification can not be mitigated, continued conversion of operationally capable 110' WPBs is not recommended. Current mitigation efforts, if not pursued more aggressively, will adversely impact the effectiveness and safety of operations. For those Deepwater program assets who share the critical components

Subj: UPDATE OF THE 123-FOOT PATROL BOAT (123' WPB)
OPERATIONAL ASSESSMENT ANALYSIS OF 29 SEP 04

operations, continued program development for those assets should include a comprehensive test program that is structured to provide timely risk assessment and recommendations to the program manager.



DAVID ARCHITZEL

Copy to:
COMDT HQ (G-O, G-D, G-OC, G-OCU, G-OCD)
COMLANTAREA (AOF)
CCGDSEVEN MIAMI
COMCOGARD SECTOR KEY WEST FL

123' WPB OAA Update Matrix and Comments

Recommendation from OAA Report	Risk #	Associated Risk from OAA Report	OAA Report Update Comments
The following must be implemented prior to OPEVAL:		High Risks associated with prior to OPEVAL recommendations	
1.1 Develop and publish detailed procedures, including tabular reference, for recovery of the SRP aboard the cutter in all potential sea states from U through 4. Procedures should include the recommended ships course relative to the seas and the recommended ordered speed. Procedures should also address the shaft engagement/disengagement considerations (see page 13, par. 4.3.3). (Tactics)	4.3.3	The propeller wash and "rooster tail" of the 123' WPB created a potentially unsafe environment for boat operations in sea states 1 and higher. In order to recover the SRP, the cutter was required to establish a procedure to provide the dynamic conditions at the ramp for each sea state that provided acceptable conditions for boat recovery. Recovery with no way on was difficult in any sea state, as the stability of the cutter and the SRP jet drive maneuverability was dependent on movement. Higher speed meant more control. The 123' WPB was required to clutch in on one or both shafts in order to establish steerageway and obtain the best relative seas. When clutched in, the 123' WPB generated a significant propeller wash which could not be overcome by the SRP, requiring the 123' WPB to de-clutch its engine(s) just prior to the commitment of the SRP coxswain to a recovery. Timing was critical. The 123' WPB would lose steerageway and provide an unsafe condition if the SRP was not immediately recovered. This process in heavier seas resulted in a smaller time window for the coxswain to make his approach into the ramp, subjecting the SRP to increased propeller wash during recovery. (This may have significant implications for similar recovery processes in the larger cutter classes (WMSL, WMSM, WPC)).	SRP draft recovery procedures were developed by the contractor subsequent to the OAA report. These procedures were generic, untested, and had not been demonstrated by the developer on any of the delivered cutters. None of the four cutters observed during this assessment review period had been provided with a copy of the procedures for review or possible implementation. Each cutter was developing its own unique set of recovery procedures. Some recovery procedures varied significantly in fundamental processes and each with its own unique safety considerations. While there may be more than one set of procedures developed by individual cutters in order to safely recover the SRP in lower sea states, there was significant risk to personnel and equipment because tested and proven procedures were not developed for this evolution in higher sea states. Safety of recovery remains a significant risk to the effectiveness of the stern notch recovery system.
1.2 Test, certify, and provide documentation validating the safety of all components of the SRP recovery system (see page 53, par. 18.2.1.1). (Safety)	18.2.1.1	The SRP recovery line and securing equipment were unsafe. The cutter's recovery line parted during a recovery attempt and the default solution was to "use a larger line" without a tested and certified replacement. Results of a dynamic study and certification were not available identifying the proper size and length of line for SRP capture. The bits that terminate the securing line had no test certification. The winch assembly (drum, line, and recovery hook) had no certification. Upon completion of the SRP recovery, while the weight of the boat stresses the winch line, the on deck line handler was required to attach the securing cable to the prow of the SRP keel which required reaching between the life rails and under the bow of the SRP and the tensioned recovery line in order to attach the securing hook.	There was no standard SRP recovery line on the cutters. Each of the cutters was delivered a different line and there were no specifications provided for line composition, size, or length. Three of the cutters had replaced the line provided by the developer after they had been evaluated by the cutter as unsuitable or unsafe for use. The length and elasticity of the recovery line are critical design parameters impacting the operational loads that will be experienced by the SRP recovery system components. Risks associated with the large forces generated during SRP recovery compounded by the variation in recovery equipment configurations remain high. None of the bits that are used to recover the SRP had been certified for the function they are performing.
1.3 Replace the prescribed 4-inch nylon tow line (breaking strength of 38,400 lb) on the 123' WPB with a tow line of breaking strength below the safe working load of the tow bit (currently 14,400 lb). This is essential to eliminate the reality of bit failure before line failure (see page 53, par. 18.2.1.3). (Note that	18.2.1.3	The tow bit static load test report certified a safe working load which was less than the safe working load of the tow line. This is a significant safety hazard as the bit is subject to failure before the line.	There were three different sized tow lines provided to four of the cutters, each one with a breaking strength that significantly exceeds the safe working load of the towing bit. Two of the tow lines have a breaking strength that is over twice the 150% static test load of the towing bit. There is no documentation provided to the cutters that provides the static and dynamic forces expected to result from a 500 long ton tow that will be transferred to the unusually high tow post and taff railing. The potential heeling moments and

1

Encl (1)

CGC METOMPKIN was provided with a 5-inch tow line of 60,000 lb safe working load.) (Safety)			stability documentation was not available for cutter use and there was no certification data for any of the towing tackle. This remains a significant safety issue.
1.4 Require the immediate installation of equipment, software, security, and certifications necessary for implementation, testing, and operation of the COP. This is a significant increase in advertised capability that has not been demonstrated after four deliveries (see page 11, par. 3.3.1). (SDCIP)	3.3.1	The sensor suite equipment (including receivers, processing units, and display equipment) was installed but was not delivered by the contractor in a configuration capable of providing a COP. The first two cutters of the 123' WPB class were observed during this test period and were delivered without a secure communications capability or the authority to operate via tactical circuits and were in the same condition 3 months after delivery. The cutters were severely restricted in their capability to conduct SDCIP in accordance with the CONOPS. As delivered, they were limited to use of generic on-board sensors. The new 123' WPB integrated sensor suite was designed to have the capability to provide a significant level of tactical awareness to the 123' WPB crew. The complete sensor suite has an undemonstrated potential for significant capability. It was determined that it may not be possible to effectively employ the suite due to the physical location of equipment and the resulting modifications required of watch stander responsibilities in order to support the equipment.	The equipment and software designed for generation of a local tactical picture (LTP) and contribution to and display of a common operational picture (COP) had been installed and loaded in each cutter. However, the installation had not been groomed for operations and was unable to be certified by SPAWAR. There still was no authority to operate the required C4ISR systems and the COP was not available in the cutters. There were no cutters capable of demonstrating the ability to generate a LTP or that could receive and display a COP. The inability to provide input to and receive a COP in accordance with the CONOPS remains a significant risk. Limited connectivity was demonstrated one time on one cutter, but this was conducted as a focused and dedicated proof of concept requiring significant effort and time. While there was limited equipment familiarity training provided at delivery, there had been no training provided that established a baseline of operator proficiency.
1.5 Resolve the reliability and availability of the modifications to the 123' WPB systems, including the C4ISR equipments and network, logistics support system, and the SRP recovery system, to reduce or eliminate the impact on overall cutter availability. The lack of a functioning C4ISR system, a reliable SRP and SRP recovery system, and a reliable logistics support system has the potential for significant impact on not just cutter, but Group/Sector availability to respond to mission tasking (see page 36, par. 12.3.1). (Availability)	12.3.1	The inability of the 123' WPB and its new systems to be ready for test event tasking provides a significant risk to the cutter being supportive of single asset or overall system readiness for real world mission tasking. The reliability and readiness of the various equipments and software supporting the C4ISR, logistics system, and the SRP and its recovery system contributed to an overall lack of availability of the 123' WPB.	The reliability and availability of C4ISR equipments and software applications for both C4ISR and LIMS systems continued to be significant in the lack of overall cutter availability to perform missions in accordance with the CONOPS. During installation grooms, significant software instability required frequent reboot which was very time consuming. When on station, mission performance continued to be limited by unreliable and unavailable software systems and certifications. Even in its limited state of functionality, the LIMS functionalities embedded in ELLIPSE and FLMS were unable to be manipulated by the crews due to availability or deficiencies in system operation manuals and a lack of operator training. SRP and recovery system component reliability and availability displayed some improvement. The cutters were generally capable of meeting mission sortie and on station requirements, although they were significantly limited in their effectiveness by operational speed and sea state restrictions imposed as a result of structural defects, which could be attributed to the hull modifications.

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1.6 Obtain damage control plates and stability diagrams, as well as the documentation and certifications that the cutter is capable of handling potential upsetting forces that may be encountered during operations. Those forces include the pulls applied to the elevated tow bit and the resulting moments towards instability during the static and dynamic forces applied by a 500 ton tow, and the potential moments encountered with the addition of the weight of 150 migrants distributed across the main deck in a standing position (see page 54, par. 18.2.1.5). (Safety)	18.2.1.5	There were no stability calculations, plans or damage control plates available to validate the stability of the 123' WPB in the following situations: - response to the lateral force potentially applied to the elevated tow bit and the resulting moment towards instability during the static and dynamic forces applied by a 500 ton tow. - response to the additional weight of 150 migrants on deck for 24 hours while in sea state 3 or higher. Partial deck loading was conducted pier side with 75 personnel on the main deck which had obvious impact on cutter trim and list conditions. During the test period, all 75 personnel were shifted to the right of centerline which resulted in a 12 degree list on the cutter while pier side.	Damage control plates and stability documentation have not been provided to the cutters. The stability and loading data report generated by the shipyard did not specifically address the stability impacts of a 7 foot high towing point nor the impact of 150 migrants on the main deck. Interpolation of diagrams included in the stability and loading data report did not provide the detail required for operational decisions that will result in significant impacts on shifts in the center of gravity.
1.7 Relocate the SRP recovery winch so that it is not subject to impact from the SRP upon recovery and subsequent loss of capability (see page 18, par. 5.5.1). (Survivability)	5.5.1	The impact of the SRP into the recovery winch could put the winch out of commission. Should this occur, the recovered SRP will be secured by the recovery line but the SRP stern will extend beyond the length of the ramp and the ship's stern door will not be able to be closed. The SRP can not be secured in the ramp without winching it in from the recovered position and there is no back up winch system.	The winch remained susceptible to being struck by the SRP during recovery and had been rendered inoperable at least once on each of three cutters. One cutter had reduced the risk of winch strike by lengthening the SRP recovery line which captured the SRP further away from the end of the notch and the winch mounting location. However, this modified procedure resulted in the SRP being in a captured condition while not completely contained in the notch of the ship with the increased potential of the SRP coming 'alive' in the notch with the right sea condition. The winch was required to retrieve the SRP into the notch rather than serving as the final few feet of the securing process. Documentation certifying that the winch is rated or designed for this purpose was not available.
1.8 Eliminate the potential for electrical shock underneath the bridge console (see page 56, par. 18.2.2.9). (Safety)	18.2.2.9	The video recorder operator on the bridge was subject to electrical shock when accessing the computer mouse from its storage location inside the ship control console via an access panel.	This risk has been eliminated by redesign of the installation.
1.9 Install a second egress for main deck berthing and the electronics work spaces. The condition of a single egress from both situations could be corrected by installation of escape scuttles to the main deck (see page 54, par. 18.2.1.6). (Safety)	18.2.1.6	A single point of egress from berthing and working spaces is a significant survivability and safety issue. There are two such instances on the modified 123' WPB. There is only one egress route from the main deck berthing spaces (CO, XO, and three other staterooms). An internal fire on the main deck blocking the ladder to the bridge would trap personnel in their staterooms. A second instance is from the COMSEC and electronics working spaces aft. Escape is not possible in the event of an electronics or engine room fire which restricts egress through the forward part of the electronics work space. (Uncorrected from COMOPTEVFOR letter of concern, reference (e).)	Unchanged. Recommend USCG validate the safety requirement for secondary egress route from berthing and working spaces to the main deck.

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1.10 Obtain TEMPEST and COMSEC certifications for all cutters. Require certifications prior to acceptance of future cutters, including crypto installation, software load, and authority to operate for all equipments (see page 22, par. 7.11.1.1). (Connectivity)	7.11.1.1	The complete C4ISR suite was either not functioning or the functionality was inaccessible due to installation faults, COMSEC problems, or incomplete documentation/training. The identification, friend or foe (IFF) equipment was not functional. MILSATCOM was not available as the ARC-210 had TEMPEST problems and was not programmable. The F77 primary underway INMARSAT data path and the Coast Guard data network (plus) (CGDN+) were not available due to an expired interim authority to connect (IATC). There was no SIPRNET path since the cutter did not meet TEMPEST and COMSEC requirements and there was no IATC. MILSATCOM voice communications were not available because a FORTEZZA card was not loaded after cutter delivery.	TEMPEST and COMSEC certifications are now being conducted satisfactorily within a few months after delivery. Additionally, equipment operational problems have been corrected for IFF, MILSATCOM, and SIPRNET installations.
1.11 Verify the ability of the networks architecture to provide security to all classified information prior to cutter delivery/acceptance (see page 26, par. 8.21.1). (Information Assurance)	8.21.1	The inability of the cutter to pass TEMPEST and to verify secure communications operational capabilities made it impossible to verify the network's capability of securing sensitive information.	Defense Information System Agency (DISA) information assurance security standards were not able to be achieved. As a result, the cutters are not being granted the required authority to operate.
1.12 Develop the tactics and associated checklists for the effective launch of the SRP for all mission requirements in the CONOPS (see page 13, par. 4.3.1). (Tactics)	4.3.1	There were no procedures for SRP launch or associated operating tactics developed or published for the cutter to support the mission requirements of the CONOPS. Although the crews of the two delivered cutters were developing their own procedures for various sea states, the design concept for a stern launch in support of various mission scenarios had not been operationally validated by the developer prior to delivery. The lack of a proven process provides high risk to the safety of the crew while experimenting with options for boat operations.	While SRP <u>recoveries</u> remain a significant risk, the tactics and procedures for SRP <u>launches</u> , although not specifically developed, presented a less severe risk to operational effectiveness of the 123' WPB. Numerous launches of the SRP in many operational situations have demonstrated that the launching procedure is relatively uncomplicated and safely executed when positive control is properly exercised by the bridge watch team and the fantail. Documented procedures and checklists for SRP launches in all sea states are still recommended.
1.13 Resolve access deficiencies with ELLIPSE and validate software and system performance on all delivered cutters. Require program/contractor validation and demonstration of FLMS and ELLIPSE software and system performance prior to acceptance of all future cutters, including the interface with the shore and deployable tool sets (see page 31, par. 10.4.1.1). (Reliability)	10.4.1.1	The ELLIPSE logistics management program was delivered to the cutter with serious access deficiencies. Crew members, working with the Integrated Coast Guard System (ICGS) site representative, were able to resolve access and password discrepancies. However, the capability to display a common product structure that combines legacy and IDS data was not demonstrated. Configuration of the on-board asset by feeding information from maintenance and inventory software was not demonstrated. Interface with the shore and deployable tool sets has not been demonstrated.	LIMS software is installed on all cutters but is unable to provide the required functionalities, either in port with ELLIPSE or underway with FLMS. ELLIPSE capabilities were limited to work order generation and shore side PMS. This is only about 10% of the twelve projected "iteration zero" ELLIPSE system capabilities. The following ELLIPSE functionalities were not able to be demonstrated: shipboard PMS (due to the lack of the scheduling module being available), financial tracking, report generation, configuration management, parts requisitioning, man-hour tracking, inventory management, work order alert notification, MILSTRIP processing, PHS&T management and purchasing management. FLMS operational functionality could not be demonstrated by any of the cutters.
1.14 Resolve the inability of the cutters to create logistics work orders via the ELLIPSE system. The capability to conduct inventory management, maintenance scheduling, and finance interfaces must also be resolved (see page	10.4.1.3	The capability to push mobile requisitions to the operations support center was demonstrated with limited success. During the test period, only one requisition was successfully processed. The crew has reverted to the casualty reporting process to fill requisitions for critical parts. The system did not demonstrate the capability to conduct inventory management, maintenance scheduling, and finance interfaces. The system was able to	All four cutters were using ELLIPSE to generate work orders on their local terminals, but manual intervention was required at the next level (Sector, District, or ICGS site rep) to make documents visible on the shore maintenance side of the system. All four cutters observed in Key West remained unable to conduct inventory management and maintenance scheduling using ELLIPSE. They were also

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32, par. 10.4.1.3). (Reliability)		generate internal work orders after several days of on-the-job training by the site representatives; however, those work orders are not available to be accessed within the ELLIPSE system.	unable to track any financial data that is a requirement for not only Deepwater supported parts, but for legacy equipment as well. Also, in order to print a work order, the text had to be copied to a word document and then printed, which was an extra step that added time to the work day when compounded by each cutter and their individual work orders. ELLIPSE did not provide any financial accounting, so the MAT reverted to using paper logs. There was no capability for the project engineers of Lockheed Martin in Moorestown to participate or observe any work done against a work order due to firewall issues with CGDN+ connectivity in Moorestown. Accordingly, all Lockheed Martin work order responses were being accomplished by either e-mail or telephone.
1.15 Provide ELLIPSE system functionality to all delivered cutters enabling them to generate supply requisitions. Require system capability prior to acceptance of all future cutters (see page 32, par. 10.4.1.5). (Reliability)	10.4.1.5	The supply department at Group Key West received no requisitions during the test period. The one requisition processed, was handled by the ICGS site representative, therefore this capability has not been demonstrated. Legacy requisitions could not be generated by ELLIPSE. Numerous legacy requisitions were attempted, but all attempts failed.	Supply requisitions were not being generated by the cutters because of difficulties in using the catalog function of ELLIPSE. Locating the ELLIPSE--required 'stock code' was a tedious and time-consuming effort that had too little return for the amount of work required. Parts requisition function was not possible as it required a 'stock code' which could not be found by the crew in the ELLIPSE catalog. The Site Rep had become the single source of Deepwater supply for the Sector Key West cutters. Sector Key West personnel had received LIMS training but were still unable to process requisitions using ELLIPSE. The permissions and approval processes were not clear to all users. The lack of financial tracking capability rendered the tool ineffective to the shore side supply activity. As a result of the cumbersome requisition processes, many items were being procured commercially.
1.16 Install, test and exercise the FLMS at-sea portion of LIMS. Require FLMS system capability prior to acceptance of all future cutters (see page 32, par. 10.4.1.6). (Reliability)	10.1.4.6	The fleet logistics management system (FLMS) portion of LIMS was not demonstrated during the test period.	FLMS software was installed and basic connectivity was demonstrated with limited success amongst the cutters. However, FLMS was not able to demonstrate an at sea operational capability.
1.17 Establish a billet capable of managing the new C4ISR computer suite and to perform COP track data management, including required training for operation, system administration, and operational maintenance (see page 40, par. 13.7.1.5). (Logistic Supportability)	13.7.1.5	The new upgrade contains a networked C4ISR suite including navigation, radar, and a COP. This enterprise contains six servers; two UNIX based and four Windows based. This points to a strong requirement for either OS or ET functionality to manage the computer suite and to perform track data management. There are no billets or training identified to support the system on board. All system administration functions are planned to reside ashore in the electronic support units/detachments. The level of C4ISR expertise for current 110' WPB crew and shore support facilities is minimal and the planned training in support of the 123' WPB upgrade appears insufficient. (Uncorrected from COMOPTEVFOR letter of concern, reference (e).)	The proposed changes to the Master Training List for the 123' WPB include the recommendations for adding CG-C2 equipment operation and bridge watch standing courses of instruction for the CO, XO, and four BMs. An undefined but limited portion of the C2 maintenance and management course of instruction has been recommended for the XO and a BM1. There appears to be a misalignment between required tasks to operate and support the C4ISR system and the practical factors of the billets assigned to the 123' WPB.

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1.18 Conduct a thorough review of formal training courses being developed to support the new cutter systems. Ensure that appropriate training courses and lesson plans, for both schoolhouse and self-study, are adequate for formal training and shipboard study and are being provided to the USCG training commands for implementation (see page 46, par. 16.3.1). (Training)	16.3.1	IDS training was not compatible with legacy training systems for an experienced 110 crew who transferred to the 123' WPB (CGC NANTUCKET to CGC MATAGORDA). Training for ELLIPSE/COMDAC INS/EO/IR Surveillance System was found to be severely inadequate and there were many areas where the crew received no training at all. There were no formal training course handouts, no electronic on-board training programs, no revised or new personnel qualification standards documents, and no formal lesson plans provided to USCG training commands to support current operators and maintainers. Delivery training may prove adequate for current crews, but there is no pipeline training planned for follow-on crew members or support personnel.	A draft 123' WPB Master Training List (MTL) is in the early stages of development as well as identification of possible courses of instruction that may be possible for inclusion in the TRACEN training architectures. The processes required to create the required courses and develop the administrative and personnel infrastructure to support their effectiveness will take time. Nine new courses of instruction are currently included in the draft 123' WPB MTL. In the interim, there are no self study courses, no electronic on-board training courses, no updated PQS booklets, or other training systems developed to fill the period until and if formal courses of instruction can be developed. While the current crews of delivered cutters were provided some introductory level of training by the developer at delivery, that training was not sufficient to give even these now experienced crews the ability to effectively operate and maintain their new equipments. There is no process in place to train the relieving crewmembers arriving this summer for those cutters already delivered. Because of this, the long-term sustainability of current/qualified crews for the 123' WPB in the Coast Guard's existing personnel accession, training, and assignment process is at risk.
1.19 Install a second ARC-210 UHF transceiver so that the 123' WPB can conduct simultaneous line-of-sight and satellite communications (see page 22, par. 7.11.1.2). (Connectivity)	7.11.1.2	The 123' WPB was provided with a single ARC-210 UHF transceiver which replaced two UHF transceivers currently in use on the 110'. During representative missions, a WPB routinely requires both UHF radios to be in simultaneous use. The 123' WPB ARC-210 can function in either line-of-sight or satellite communications (SATCOM) mode but not simultaneously. This represents a loss of functionality and a single point of failure with respect to UHF communications.	This remains a reduction in capability from the 110' WPB. The current performance of the ARC-210 was hampered by lack of training for both operations and the programming and loading of crypto material. With the elimination of UHF satellite radio redundancy, there was a single point of failure in satellite comms that impacts the capability for both voice and tactical data (COP) connectivity.
1.20 Incorporate special emergency operations training and onboard team training including update of drill and grade sheets based on revised navigation standards and main space fire doctrine (see page 40, par. 10.3.1). (Training)	16.3.1	IDS training was not compatible with legacy training systems for an experienced 110 crew who transferred to the 123' WPB (CGC NANTUCKET to CGC MATAGORDA). Training for ELLIPSE/COMDAC INS/EO/IR Surveillance System was found to be severely inadequate and there were many areas where the crew received no training at all. There were no formal training course handouts, no electronic on-board training programs, no revised or new personnel qualification standards documents, and no formal lesson plans provided to USCG training commands to support current operators and maintainers. Delivery training may prove adequate for current crews, but there is no pipeline training planned for follow-on crew members or support personnel.	An updated main space fire doctrine had been drafted and was being exercised by the crews, and satisfactory execution was part of the ready for operations certification by Sector Key West. No other updates were observed that modified other onboard operational procedures, training packages and drill sheets for ship evolutions that have been impacted by the modifications.

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USCG Q&A 631

QUESTION: When (if) was the MATAGORDA visual TEMPEST test redone and by whom (the last date of testing) and can you tell (or is it classified) the result of the instrumented test conducted in February 2004? We don't need the data - just the result (which the IG already ostensibly reported).

Or is February 2004 the last date of TEMPEST testing - implying that the Matagorda at least was never TEMPEST certified (because the visual was not passed and we know it is not certified in September 2004 and the Coast Guard has not provided the date of any other re-testing when it could have passed visual).

ANSWER: The MATAGORDA had TEMPEST waivers for any visual discrepancies that were not corrected. There was not a re-test. MATAGORDA Visual TEMPEST Inspection (VTI) was conducted 19-21 February 2004 and produced a list of discrepancies. The Instrumented TEMPEST Survey (ITS) for CGC MATAGORDA was conducted 18 to 24 February 2004 and the result of the survey is classified SECRET.

MATAGORDA was first given Interim Authority to Operate (IATO) on 14 October 2004 and Authority to Operate (ATO) on 19 January 2005. (Note: IATO followed the COMOPTEVFOR Operational Analysis Assessment (OAA) by approximately 3 weeks.) IATO or ATO cannot be granted if there are any compromising emanations. Specific results cannot be discussed as they are documented in the classified instrumented survey report.

In October 2004, when IATO was granted, MATAGORDA had outstanding discrepancies from her VTI. Visual inspection discrepancies may be waived if, in fact, there are no compromising emanations noted by the ITS. The Secure Electrical Information Processing System was again inspected by Mr. Ronald T. Porter of the Coast Guard Telecommunications and Information Command on 19 December 2004.

The Coast Guard 123 WPB class TEMPEST waivers were established by TISCOM on 12 July 2005. (TISCOM Memorandum 2241). An example of a waiver was for an unclassified radio located within 3 meters of classified servers. This was identified as a discrepancy during visual inspection. The waiver is appropriate since a WPB is a small ship and does not have a large communications room or combat information center (as you would find on a Navy ship or larger Coast Guard cutter) – the size of the communications room on a WPB-123 is only approximately 3 meters by 2.5 meters. This physical size makes it impractical to provide the 3 meter separation. The TEMPEST instrumented survey results were sufficient so the visual inspection discrepancy should be (and was) waived.

USCG Q&A 632

QUESTION: Also, was TEMPEST a requirement from the beginning of this contract? If so, please provide the document from the contract showing that explicit requirement.

ANSWER: The requirement for TEMPEST was part of the original Delivery Task Order for MATAGORDA (the first 110 converted to 123), as part of the Cutter Specific Certification Matrix, copied below:

Sort	SWBS	Title	Topic	Std	Amplification of Standard	Adjudication of Standard	Method of Verification	Date Modified / NA
582	402	Electronics Systems	Installation Standard	MIL-HDBK-232A (1998)*	Red/Black Engineering Installation Guidelines added as a result of the modification to the vessel.	Required	Examination	09/07/01

* MIL-HDBK-232A (1998) provides fundamental guidance to engineer and install electronic systems that process or communicate classified information. It contains guidance which will, when used in conjunction with department/agency directives, aid in the protection of such information by reducing the probability of hostile interception and exploitation.

APR 13 2007

The Honorable Elijah E. Cummings
Chair, Subcommittee on Coast Guard
and Maritime Transportation
Committee on Transportation and Infrastructure
2235 Rayburn House Office Building
Washington, DC 20515

Dear Chairman Cummings,

Thank you for the opportunity to address the concerns expressed in your letter dated April 13, 2007. I am committed to providing you with a full accounting of these issues. Enclosed is the information you requested. With respect to the test results from the second visual inspection on MATAGORDA, there is no formal test report. Rather, a list was generated and forwarded for corrective action to the appropriate personnel. The list and transmittal email string is enclosed for your review.

The Coast Guard takes Information Assurance and TEMPEST testing very seriously. Throughout the entire process, all procedures were conducted in accordance with accepted guidelines and by fully qualified personnel. The TEMPEST waiver process is also a rigorous process, with strict guidelines regarding when and under what conditions waivers may be granted.

In addition to the information that you have specifically requested, I have also included a copy of the 123' WPB Class TEMPEST Waiver. Normal procedures are to conduct an instrumented test on the first vessel in a class, with visual inspections conducted on subsequent vessels to ensure compliance with the approved configuration. As such, and in response to your question requesting the dates of any instrumented tests performed on 123' WPBs other than MATAGORDA and PADRE, no other instrumented tests were performed. The second test conducted on PADRE was an anomaly in the normal TEMPEST testing process.

I am happy to answer any further questions you may have, or your staff may contact my House Liaison office at (202) 225-4775.

Sincerely,


Thad W. Allen
Commandant
United States Coast Guard

Encl: (1) USCGC MATAGORDA second visual TEMPEST inspection results and email string
(2) Visual TEMPEST inspection report for PADRE
(3) Visual TEMPEST inspection reports for MATAGORDA, MONHEGAN,
METOMPKIN, NUNIVAK, ATTU, VASHON, and MANITOU
(4) 123' WPB Class Tempest Waiver

ELIJAH E. CUMMINGS
7TH DISTRICT, MARYLAND

COMMITTEE ON
TRANSPORTATION AND INFRASTRUCTURE
CHAIRMAN, SUBCOMMITTEE ON COAST
GUARD AND MARITIME TRANSPORTATION
SUBCOMMITTEE ON HIGHWAYS AND TRANSIT
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POST OFFICE AND THE DELIVERY OF MAIL
COMMITTEE ON ARMED SERVICES
SUBCOMMITTEE ON READINESS
SENIOR WHIP

**Congress of the United States
House of Representatives**

Washington, DC 20515

April 13, 2007

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Admiral Thad Allen
Commandant, United States Coast Guard
US Coast Guard Headquarters
2100 2nd Street, SW
Washington DC, 20593

Dear Admiral Allen:

I write today to thank you for the tour you provided of the 110/123-foot cutters and for your candid discussion both of the problems that plagued the 110/123 conversion and of the future of the Deepwater program.

I also thank you for your willingness to immediately address the delays that the staff of the Committee on Transportation and Infrastructure and of the Subcommittee on Coast Guard and Maritime Transportation have encountered in receiving requested documents from the Coast Guard. To ensure that we are able to complete our investigation of the 123 program prior to the hearing to be held on April 18 on compliance with the requirements of the Deepwater contract, I write today to ask that the following documents be provided to my office no later than 1:00 p.m. on April 13:

- 1) All test results from the second visual TEMPEST inspection conducted of the USCGC MATAGORDA on December 19, 2004;
- 2) All test results from any visual TEMPEST inspections conducted at any time on the USCGC PADRE;
- 3) All test results from any other visual TEMPEST examination conducted on any of the 110/123 cutters; and,
- 4) The dates of any instrumented tests performed on any 110/123 other than MATAGORDA in February 2004 and PADRE in July 2006.

On March 20, 2007, I requested all "reports and analysis pertaining to the C4ISR testing done on the MATAGORDA." In response to that request, I received information on the visual and instrumented TEMPEST exams performed on the MATAGORDA in February 2004. However, my office learned yesterday that a second visual TEMPEST exam was performed on MATAGORDA on December 19, 2004. As records associated with that exam (including a list of any deficiencies identified during that exam) have not yet been provided and time is running short, it is urgent that we receive the records today.

PRINTED ON RECYCLED PAPER

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Admiral Allen
April 13, 2007

Importantly, as the DD-250 for MATAGORDA appears to make MATAGORDA's compliance with TEMPEST requirements following its February 2004 test contingent on the results of TEMPEST testing of at least one ship in the 110/123 class, we urgently need any non-classified records associated with the PADRE or any other 110/123 that was subjected to any TEMPEST testing of any kind by any agency.

I thank you again for your hospitality during my visit to the Baltimore Coast Guard Yard on April 12 and for your continued cooperation with my requests for information. Please do not hesitate to contact me whenever I may be of assistance.

Sincerely,

A handwritten signature in black ink, reading "Elijah E. Cummings". The signature is stylized with a large, prominent "E" and a cursive "Cummings".

Elijah E. Cummings
Chair, Subcommittee on Coast Guard and Maritime Transportation

From: Porter, Ronald
Sent: Wednesday, December 22, 2004 9:10 AM
To: Jones, David L.; Wright, Richard; Prokes, Terrence; Wharton, Rick; Wilhelm, Douglas G; Buford, Danny D. (Ship Systems); Calvin, Wally (Ship Systems); Colella, Harry (EXT); Conrad, Robert D. (Ship Systems); Driscoll, John LCDR; Frei, Kevin R; Hajduk, Philip J; Lang, Donald H; McLaverty, Brian; Meredith, Lawrence O; Mihelic, Joseph; Payne, Jeffrey LTJG; Talley, Shonda; Adkins, Steve; Alto, Alan; Ayala, Hala; Bassolino, John; Bauer, Sarah; Boyd, Barry ELC2; Boyd, Jay; Boyd, Jay; Brewer, George M ENG3; Cownie, Brodie LCDR; Figueroa, Nylsa; Fleming, Benjamin LT; Fontana, Richard CDR; Hartinger, Dan; Harwood, Fred; Henke, Douglas; Hernandez, Glenn LCDR; Hested, Jim; Illuminate, Dave; Jacoby, Chad LCDR; Driscoll, John LCDR; Leeper, Hank; Leeper, Henry; McLaughlin, Daniel CDR; Mitchell, Sean LT; Pearson, Steve; Powers, Geoffrey; Prokes, Terry; Reynolds, James LT; Rishar, David; Russell, Douglas CAPT; Sconiers, Thomas CWO; Walz, Michael CDR; Wood, John CDR
Cc: Carter, Justin LT; Carter, Justin LT
Subject: RE: MATAGORDA_122004_2200, METOMPKIN_122004_2200
Attachments: CGC MATAGORDA.doc



CGC
TAGORDA.doc (27)
All,

Attached is pending TEMPEST discrepancy list for Matagorda.

ron
Ronald T. Porter
USCG TISCOM (isd-3b)
TEMPEST Program Manager
703-313-5631 (STU-III)
703-313-5640 (FAX)

From: Jones, David L.
Sent: Wednesday, December 22, 2004 8:32 AM
To: 'Wright, Richard'; Prokes, Terrence; Wharton, Rick; Wilhelm, Douglas G; Buford, Danny D. (Ship Systems); Calvin, Wally (Ship Systems); Colella, Harry (EXT); Conrad, Robert D. (Ship Systems); Driscoll, John LCDR; Frei, Kevin R; Hajduk, Philip J; Lang, Donald H; McLaverty, Brian; Meredith, Lawrence O; Mihelic, Joseph CAPT; Payne, Jeffrey LTJG; Porter, Ronald; Talley-Green, Shonda; Adkins, Steve; Alto, Alan; Ayala, Hala; Bassolino, John; Bauer, Sarah LTJG; Boyd, Barry CWO; Boyd, Jay; Boyd, Jay F.; Brewer, George CWO; Cownie, Brodie LT; Figueroa, Nylsa; Fleming, Benjamin LT; Fontana, Richard CDR; Hartinger, Dan; Harwood, Fred; Henke, Doug; Hernandez, Glenn; Hested, Jim; Illuminate, Dave; Jacoby, Chad CDR; Driscoll, John LCDR; Leeper, Hank; Leeper, Henry; McLaughlin, Daniel CDR; Mitchell, Sean LT; Pearson, Steve; Powers, Geoffrey; Prokes, Terry; Reynolds, James LT; Rishar, David; Russell, Douglas CAPT; Sconiers, Thomas CWO; Walz, Michael CDR; Wood, John CDR
Cc: Carter, Justin LT; Carter, Justin LT
Subject: RE: MATAGORDA_122004_2200, METOMPKIN_122004_2200

I confirmed this morning that a copy of the scan results was left with LM engineers on the ship.

From: Wright, Richard [mailto:Richard.Wright@dwicgs.com]

ENCLOSURES(1)

1

Sent: Tuesday, December 21, 2004 9:50 PM
To: Prokes, Terrence; Wharton, Rick; Wilhelm, Douglas G; Buford, Danny D. (Ship Systems); Calvin, Wally (Ship Systems); Colella, Harry (EXT); Conrad, Robert D. (Ship Systems); Driscoll, John LCDR; Frei, Kevin R; Hajduk, Philip J; Lang, Donald H; McLaverty, Brian; Meredith, Lawrence O; Mihelic, Joseph CAPT; Payne, Jeffrey LTJG; Porter, Ronald; Talley-Green, Shonda; Adkins, Steve; Alto, Alan; Ayala, Hala; Bassolino, John; Bauer, Sarah LTJG; Boyd, Barry CWO; Boyd, Jay; Boyd, Jay F.; Brewer, George CWO; Cownie, Brodie LT; Figueroa, Nylsa; Fleming, Benjamin LT; Fontana, Richard CDR; Hartinger, Dan; Harwood, Fred; Henke, Doug; Hernandez, Glenn; Hested, Jim; Illuminate, Dave; Jacoby, Chad CDR; Jones, David L.; Driscoll, John LCDR; Leeper, Hank; Leeper, Henry; McLaughlin, Daniel CDR; Mitchell, Sean LT; Pearson, Steve; Powers, Geoffrey; Prokes, Terry; Reynolds, James LT; Rishar, David; Russell, Douglas CAPT; Sconiers, Thomas CWO; Walz, Michael CDR; Wood, John CDR
Cc: Carter, Justin LT; Carter, Justin LT
Subject: RE: MATAGORDA_122004_2200, METOMPKIN_122004_2200

Any new status on Matagorda (scans, etc)

Rich

Richard Wright
ICGS C4ISR Domain Program Manager

US Coast Guard Integrated Deepwater System
office: 571.218.3426 / mobile: 571.214.5508

richard.wright@dwicgs.com
"... Mission success IS customer satisfaction!"

-----Original Message-----

From: Prokes, Terrence [mailto:TProkes@comdt.uscg.mil]
Sent: Tuesday, December 21, 2004 4:14 PM
To: Wharton, Rick; Wilhelm, Douglas G; Buford, Danny D. (Ship Systems); Calvin, Wally (Ship Systems); Colella, Harry (EXT); Conrad, Robert D. (Ship Systems); Driscoll, John LCDR; Frei, Kevin R; Hajduk, Philip J; Lang, Donald H; McLaverty, Brian; Meredith, Lawrence O; Mihelic, Joseph CAPT; Payne, Jeffrey LTJG; Porter, Ronald; Talley-Green, Shonda; Wright, Richard; Adkins, Steve; Alto, Alan; Ayala, Hala; Bassolino, John; Bauer, Sarah LTJG; Boyd, Barry; Boyd, Jay; Boyd, Jay F.; Brewer, George CWO; Cownie, Brodie LT; Figueroa, Nylsa; Fleming, Benjamin LT; Fontana, Richard; Hartinger, Dan; Harwood, Fred; Henke, Doug; Hernandez, Glenn; Hested, Jim; Illuminate, Dave; Jacoby, Chad; Jones, David; Driscoll, John LCDR; Leeper, Hank; Leeper, Henry; McLaughlin, Daniel; Mitchell, Sean LT; Pearson, Steve; Powers, Geoffrey; Prokes, Terry; Reynolds, James LT; Rishar, David; Russell, Douglas; Sconiers, Thomas CWO; Walz, Michael; Wood, John
Cc: Carter, Justin LT; Carter, Justin LT
Subject: RE: MATAGORDA_122004_2200, METOMPKIN_122004_2200
Importance: High

Rick,

Metompinkin schedule needs some major re-writes so the dates align (i.e. SSAA package not delivered to SMO until 2/8/05 - Testing conducted 1/19/05?). Recommend we review it at the meeting.

Some items I noted:

Line # 21: Vessel schedule to depart BSI on 1/10/05

Line # 41: Vessel will not be launched until 1/4/05

Line #42: Suspect this date will be 1/5/05

Line #?: Need to add update Phone System

Line #90: Re-inspection not required - change to "Notify D7 Security MGR of corrections" & "D7 Security MGR issues letter"

Line # ??: Add line to Visual Tempest Inspection "Install screen in LE Locker Door"

Line #121 & 122: Apply for and ATO approved on 1/26-2/1 conflict with lines 123 thru 130 SSAA package dates 2/2-8/05 (SSAA package must be submitted before ATO is approved).

Lines # 131-138: Dates do not match SSAA Package dates (lines 123-130) and Software Vulnerability dates (lines 106-122)

Line #154: Testing dates are scheduled before all requirements are completed (i.e. Software Vulnerability - line 106, SSAA package - line 123, SIPRNET ATO - line 131.

Thanks,

Terry Prokes
ILS Transition Manager
Commandant (G-DTM)
U.S. Coast Guard
Deepwater Transition Management
e-mail: tprokes@comdt.uscg.mil
PH: 202.267.0445
Cell: 202.498.2591

-----Original Message-----

From: Wharton, Rick [mailto:Rick.Wharton@dwicgs.com]

Sent: Monday, December 20, 2004 11:21 PM

To: Wilhelm, Douglas G; Buford, Danny D. (Ship Systems); Calvin, Wally (Ship Systems); Colella, Harry (EXT); Conrad, Robert D. (Ship Systems); Driscoll, John LCDR; Frei, Kevin R; Hajduk, Philip J; Lang, Donald H; McLaverty, Brian; Meredith, Lawrence O; Mihelic, Joseph CAPT; Payne, Jeffrey LTJG; Porter, Ronald; Talley-Green, Shonda; Wright, Richard; Adkins, Steve; Alto, Alan; Ayala, Hala; Bassolino, John; Bauer, Sarah LTJG; Boyd, Barry CWO; Boyd, Jay; Boyd, Jay F.; Brewer, George CWO; Cownie, Brodie LT; Figueroa, Nylsa; Fleming, Benjamin LT; Pontana, Richard CDR; Hartinger, Dan; Harwood, Fred; Henke, Doug; Hernandez, Glenn; Hested, Jim; Illuminate, Dave; Jacoby, Chad CDR; Jones, David; Driscoll, John LCDR; Leeper, Hank; Leeper, Henry; McLaughlin, Daniel CDR; Mitchell, Sean LT; Pearson, Steve; Powers, Geoffrey; Prokes, Terry; Reynolds, James LT; Rishar, David; Russell, Douglas CAPT; Sconiers, Thomas CWO; Prokes, Terrence; Walz, Michael CDR; Wharton, Rick; Wood, John CDR

Subject: MATAGORDA_122004_2200, METOMPKIN_122004_2200

Matagorda departed BSI today, one day earlier than planned to avoid weather later in the week. All warranty items corrected with the exception of the steering system breather cap, which will be shipped to the boat in Key West. Several C4ISR items being tested enroute Key West. Low Smoke Cable and Cable Tag DD-250 items pend resolution, but have no operational impact on the cutter. Solid door to LE locker was modified to an expanded metal cage-type door, eliminating the need for a protected distribution system for red cables in the space. If CATV filter/attenuator cannot be obtained in time to support TEMPEST final cert, cable will be disconnected (already discussed with Ron Porter) Talked with Dave Jones this morning - TISCOM personnel were onboard performing a scan of the

C4ISR software enroute New Orleans. Plan for SPAWAR to scan 27 Dec. ATO remains on track to be completed before 12 Jan.

BSI and on-site LM personnel turning their attention to Metompinkin. Plan is to complete most of the outstanding warranty/DD-250 items before holiday shutdown. Fins have been removed and port lower bearing housing being replaced. Damaged prop being replaced with props (replaced as a pair) originally intended for Manitou - next set, intended to be spares, will be available early January in plenty of time to support Manitou launch.

<<MATAOGORDA_122004_2200.pdf>> <<MATAOGORDA_122004_2200.mpp>> <<METOMPKIN_122004_2200.pdf>> <<METOMPKIN_122004_2200.mpp>>

--
Rick Wharton
Northrop Grumman Ship Systems
123 WPB Asset Manager
Integrated Coast Guard Systems, LLC
US Coast Guard Deepwater Program
Ph: (571) 218-3221
Cell: (703) 627-0048
Fax: (571) 218-3342

USCGC MATAGORDA – SECOND VISUAL TEMPEST INSPECTION
December 19, 2004

CGC MATAGORDA

1. Secure ground for ARC-210. Ground is loose. Recommend removing nut on front of braid to ensure maximum contact with equipment shelf.
2. Hand-held radios less than one meter from STE. Recommend unit SOP be worded to turn radios off prior to charging. Post sign to emphasize same.

CO's STATEROOM

3. Separate CLASSIFIED and UNCLASSIFIED LAN cables by two inches.

XO's STATEROOM

4. Separate CLASSIFIED and UNCLASSIFIED LAN cables by two inches.

CLASSIFIED SERVER ROOM

5. CATV isolator required on cable prior to exiting ship. Recommend placing isolator in Cabinet 5 of UNCLAS Server rack.
6. Recommend CLASSIFIED and UNCLASSIFIED stickers on LAN outlet boxes in view of the fact that the connectors and jacks are interchangeable.



2241
05.0041
8 March 2005

MEMORANDUM

From: *[Signature]*
B. J. O'Keefe CAPT
MLCLANT (t)

Reply to (tp-1)
Attn of: Ernestine Cook
(757) 628-4051

To: CGC PADRE (WPB 1328)

Subj: TEMPEST INSPECTION OF USCGC PADRE (WPB 1328)

Ref: (a) NSTISSAM 2-95 Red/Black Installation Guidance
(b) DOD IA PUB 5239-31 Information assurance Shipboard Red/Black
(c) COMDT COGARD Washington DC//CG-62//042137Z Mar 04

1. ET2 Timothy Cole, ESD New Orleans, conducted a re-inspection of the Secure Electrical Information Processing System (SEIPS) on CGC PADRE on 28 January 2005. The re-inspection was conducted as required by references (a), (b), and (c).

2. Enclosure (1) is a summary of minor discrepancies with the SEIPS. No serious TEMPEST hazards were noted; therefore, you may continue normal operations. In accordance with reference (c), discrepancies must be corrected within 90 days. You should contact Ms. Ernestine Cook to schedule a re-inspection. This summary also provides a record of the installation at the time of inspection. Modifications or changes to the SEIPS shall not be made without approval of TISCOM (isd-3d) or MLCA.

3. This summary and amendments to this summary shall be retained in the unit's SEIPS (TEMPEST) documentation file.

#

Enclosure: (1) Visual Tempest Inspection Summary

Copy: COMDT (CG-6, G-DPM-3)
LANTAREA (AOL) *[Signature]*
TISCOM (isd-3b)
ESU New Orleans
ESD New Orleans
ESU Miami
ESD Key West

ENCLOSURE(2)

Visual TEMPEST Inspection Summary

The entire Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. Radio Room
2. State Rooms
3. Bridge

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

SF Correction of the discrepancy is within the capability of ship's force.

SFC Correction of the discrepancy was completed by ships force prior to completion of inspection visit.

IA Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy.

IAC Indicates that an industrial activity corrected the discrepancy.

SA Indicates that the assistance of a support activity is probably required to properly correct the discrepancy.

SAC Indicates that a support activity corrected the discrepancy.

Column C: Document Reference to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

Enclosure (1)

Discrepancies and Corrective Action Report

1. Radio Room 2-28-O-Q

A	B	C	Narrative
001	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	There is no separation between Classified LAN and Unclassified LAN outlets. CORRECTED
002	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	Classified LAN lines are run with 120VAC power lines (no separation). CORRECTED
003	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	Coax TV line runs along with Classified LAN line. CORRECTED
004	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.B Note 2	There is no separation between alarm panel line and Classified LAN line. WAIVED
005	IA/SA	NSTISSAM 2-95 Rec I Paragraph 2.B	The printer (red) along with Classified LAN line runs parallel with IFF antenna line. There is no separation of these lines. WAIVED
006	IA/SA	IA PUB 5239-31 Paragraph A.1.1.2	The printer (red) uses black power. The printer router (red) uses black power. WAIVED
007	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	There is no 3-meter separation between printer (red) and IFF transmitter. WAIVED
008	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	In Rack #3, there is no 3-meter separation between red and black cables before entering the Marcom switch. WAIVED
009	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	In Rack #3, there is no 3-meter separation between cryptographic equipment and RT9000 transceiver. WAIVED
010	IA/SA	IA PUB 5239-31 Paragraph A.1.1.7.3.1.B	There is not a secure Protected Distribution System (PDS) leaving Radio Room. LE Locker behind Secure Space. WAIVED
011	IA/SA	NSTISSAM 2-95 Paragraph 4.9.6	Cable TV system needs to use an amplifier/attenuator at the point of entry into the secure space and needs to be of a type that provides one-way filtration. CORRECTED
012	SA	IA PUB 5239-31 Paragraph B.1.2.6.2	IFF transmitter needs ground. Removal of paint and dirt from ground. NEEDS TO BE COMPLETED

2. State Rooms 1-16-1-L / 1-16-2-L

001	IA/SA	IA PUB 5239-31 Paragraph B.1.2.6.2	There is no separation between Classified LAN outlets and 117 VAC, Unclassified LAN, and TV Jack outlets. WAIVED
002	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.A	There is no separation between Classified LAN line and MF/HF line. CORRECTED
003	IA/SA	NSTISSAM 2-95 Rec I Paragraph 3.	In State Room 1-16-2-L, Classified LAN line runs parallel with horn generator line. CORRECTED

3. Bridge

A	B	C	Narrative
001	IA/SA	NSTISSAM 2-95 Rec I Paragraph 6	There is no 3meter separation between red output and black lines for the Kite handset #1 and #2. WAIVED
002	IA/SA	IA PUB 5239-31 Paragraph B.1.2.6.2	Classified LAN line runs parallel with 117 VAC, Black Data lines, and cellular antenna line. CORRECTED
003	SA	IA PUB 5239-31 Paragraph B.1.2.6.2	Need to remove paint and add clean ground for RCU-9310 radio. NEEDS TO BE COMPLETED



2241
July 12, 2005

MEMORANDUM

Ronald T. Porter
From: Mr. Ronald T. Porter
CG TISCOM (isd-3b)

Reply to TISCOM (isd-3b)
Attn of: Ronald T. Porter
703.313.5631

To: Commander, Maintenance and Logistics Command Atlantic (t)
DIRECTOR, Deepwater Integrated Coast Guard Systems

Subj: 123 WPB CLASS TEMPEST WAIVER

Ref: (a) NSTISSAM TEMPEST 2-95
(b) IA PUB 5239-31 INFORMATION ASSURANCE SHIPBOARD RED/BLACK
INSTALLATION PUBLICATION

1. The Secure Electrical Information Processing System (SEIPS) on CGC MATAGORDA was inspected by Ronald Porter, USCG TEMPEST Program Manager on 14 December 2004. The inspection was conducted using criteria listed in references (a) and (b), and below is the list of discrepancies waived. If there is a configuration change which includes, but is not limited to replacement of Classified server(s) with different model(s) or addition of equipment in the Secure Communications space, an Instrumented TEMPEST Survey will be required. DWICGS shall identify funding for future Instrumented Testing.
2. Below waivers are class-wide and should be considered when reviewing Visual TEMPEST Inspection Reports.
3. A waiver is granted for the location of the RT-1794 (p/o AN/ARC-210) transceiver within three meters of Classified servers. This waiver is based on the results of the Instrumented TEMPEST Test
4. A waiver is granted for three meter separation between RED and BLACK cables entering the MARCOM switch. Subject switch provides adequate isolation and is approved for multi-level signal switching.
5. A waiver is granted for three meter separation between cryptographic equipment and RT9000 transceiver. The distance is approximately one meter, however a bulkhead separates the Unclassified and Classified equipment racks. Due to a favorable Instrumented TEMPEST test, and the fact that the RT-9000 transceiver is enclosed in its original metallic enclosure, and there are metal side panels on the equipment racks.
6. A waiver is granted for three meter separation between RED printer and IFF Transmitter (UPX-28). Subject equipment is also less than three meters from Classified Servers. Subject transmitter is enclosed in its original enclosure and there is a metallic barrier on the side of the RED server rack adjacent to the UPX-28.

#

ENCLOSURES(4)

Subject: Visual TEMPEST Inspection Summary

1. This Visual TEMPEST Inspection Summary is for the FTA Visit
2. The entire Secure Electrical Information Processing System was inspected.
3. List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

A. Visited space

4. Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

SF Correction of the discrepancy is within the capability of ship's force.

IAC Correction of the discrepancy was completed by ships force prior to completion of inspection visit.

IA Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy.

IAC Indicates that an industrial activity corrected the discrepancy.

SA Indicates that the assistance of a support activity is probably required to properly correct the discrepancy.

SAC Indicates that a support activity corrected the discrepancy.

CA Indicates that the Contractor Activity is probably required to properly correct the discrepancy

CAC Indicates that the Contractor Activity corrected the discrepancy.

Column C: Reference of the paragraph in designated manuals to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

5. Discrepancy

A	B	C	Narrative
01	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2a/pg16 para 5 IA Pub 5239-31 A.1.1.1 a, b	BLACK RF Transmitter (RT-1794) is in the same rack as RED Processors. This item is waived as the result of the Instrumented TEMPEST Inspection. Any reconfiguration of equipment, which includes new equipment or replacement of existing CPUs with a different model would require another Instrumented Inspection.
02	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2b	Cabinet 3: Red processor less than one meter away from power line to black transmitter (RT-1794 p/o ARC-210). Refer to Item #1.
03	CA	NSTISSAM TEMPEST 2/95 pg 27 Para 2a	Cabinet 3: Red processor less than one meter away from black signal lines connected to RF transmitter (RT-1794) Refer to Item #1.
04	CA	NSTISSAM TEMPEST 2/95 pg 27 Para 4, Para 4.4.1.1, 4.1.1.2 IA PUB 5239-31 Para A.1.7.1 IA PUB 5239-31 MIL-STD 188- 124B Para 5.2.12	Red data cables for RED LAN have aluminum/mylar shielding. Manufacturer data: DRAKA COMTEQ (F) ShipLan Cable 4PR 24 AWG Screened 307650. Subject cable may pose a TEMPEST hazard. B.1.2.5 (5239): Approved cables. Mil-C-17 (ref k), or MIL-C-915 (reference(l)), MIL-C-24640(reference(n)) or MIL-C-24643 (reference (o)). Researched cable and found that it does NOT meet any of the above MIL-SPECs. Draka sells data cables that are MIL-DTL-24643 compliant. Subject cables are CAT 5e Shiplan '59W', '59' and '59S' Marine data cables. The cables listed all have a braided shield in addition to the aluminum mylar tape. The braided shield allows for a flexible ground. Resolved. Subject cable passed Instrumented TEMPEST test. Both RED and BLACK cables are grounded to the aluminum mylar shield. Recommend use shielded braid cable.
05	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2a/pg16 para 5 IA Pub 5239-31 A.1.1.1 a, b	BLACK transmitters (RT-9000) within 3 meters of RED processors. Waived. Subject transmitters are enclosed in metallic case and bulkhead separates the cabinets containing the transmitters and RED processors.
06	CAC	IA Pub 5239-31 Para B.1.2.6.16 pg B-8 and B-9	Missing pins on CRYPTO cable to KYV-5. Missing ground terminal connection on backshell. Completed.
07	CAC	IA Pub 5239-31 Para B.1.2.6.16 pg B-8 and B-9	ANDVT cable has no ground terminal connection on backshell. Strain relief clamp is not on outer coating of cable. Redo connection. Completed.
08	CAC	IA Pub 5239-31 Para B.1.2.6.10	AN/UPX-28 has inadequate green wire ground. Replace with Class C bond strap. Completed.
09	CAC	IA Pub 5239-31	Remove external tooth washers on ground connectors to cabinets.

			Use lock washers and lug nuts per IA Instruction 5239-31 Figure B-5. Completed.
10	CAC	NSTISSAM TEMPEST 2/95 PG 27 Para 2a/pg16 para 5 IA Pub 5239-31 A.1.1.1 a, b	UPX-28 is less than 3 meters from RED printers and processors. Waived. UPX-28 is in original enclosed cabinet and favorable Instrumented test.
11	CAC	IA Pub 5239-31 Para B.1.2.6.10	Remove green wire grounds from CRYPTO rack and replace with Class C solid bond strap. Completed.
12	CA	IA Pub 5239-31 Para A.1.1.3	Telephone cables connected to shore tie via telephone switch cannot be routed with red cables.. Resolved. Marcom switch provides adequate isolation.
13	CA	IA Pub 5239-31 Para A.1.1.7.	ARC-210 Secure voice cables. Transmit and receive audio lines need to be shielded. Resolved. Subject lines are shielded per TISCOM TEMPEST PM communication Harris Corp. Only unshielded cables are BLACK.
14	CAC	NSTISSAM 2-95 Recommendation 1 Pg 27 Para 3 Notes: 2	Operator position in Classified C4ISR room has cables from two UNCLAS LAN and three CLASSIFIED LAN connections. Require 2 inch (5 cm) separation. Completed.

Bridge

15	CAC	NSTISSAM TEMPEST 2/95 PG 27 Para 2a	Motorola VHF FM DES transceiver less than three meters from C2 Network flat panel display monitors LC 06-04-16, LC 06-04-72 and LC 06-04-84. Completed. Monitors replaced by TEMPEST compliant models.
16	CAC	NSTISSAM TEMPEST 2/95 PG 27 Para 2a	Cellular phone next to Secure LAN junction box less than three meters from flat panel display monitors LC 06-04-82 and LC 06-04-72. If a RED laptop uses the Secure LAN junction box, it will be less than three meters from cellular phone Resolved. RED LAN cables rerouted and LAN box relocated..
17	CAC	IA Pub 5239-31 Para B.1.2.6.13	No metal-to-metal contact for ground strap from ARC 210 Tray to ground on shelf. Recommend use Class C ground strap and remove paint for proper bonding. Completed.
18	CA	IA Pub 5239-31 Para A.1.1.7.2 Pg A-3	Unshielded cable connected to connector J3 on ARC-210 Tray. Twisted red wires (four) runs to C4ISR Cabinet #3. Replace cable run with proper cable. Resolved. Wires are used for control circuitry only.
19	CA	NSTISSAM TEMPEST 2/95	Issue of wireless bridge for RHIB comms. RESOLVED. Wireless connectivity is via exterior antenna. PDAs will not use wireless connectivity.

Other:

20	CAC	NSTISSAM 2-95 Recommendation I Pg 27 Para 3 Notes: 2	CO's cabin. RED and BLACK LAN ports have no cable separation. Recommend 2 inch separation. RED/BLACK cable is tied together. Corrected.
21	CA	NSTISSAM 2-95 Recommendation I Pg 27 Para 1	CO's cabin. Proposed RED laptop on desk top less than 20 inches (20 cm) from black phone. Waived due to space limitations.
22	CAC	IA Pub 5239-31 Para A.1.1.7.3.1.b	RED fiber optic cable goes through space adjacent to black racks that contains hasp for locking. If the cable passes through normally locked spaces (for example, voids, staterooms, etc), that portion of the cable shall be contained in a metallic conduit (PDS). Completed. Cage will be constructed that will provide complete viewing of the space.
23	CAC	NSTISSAM 2-95 PARA 4.9.6	Television and shipboard video (external cameras) can be viewed from the same VIDEO output jack. The shipboard video has been designated RED. Corrected. CATV isolator will be installed in Rack #5 to prevent compromising emanations from exiting inspectable space.

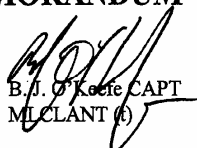
Derived From: NSTISSAM TEMPEST 2/95 with Amendment 2-95A
 Department of the Navy (DoN) Information Assurance (IA) Publication
 Module 5239-31



2241
05.0381

OCT 28 2005

MEMORANDUM

From:  B.J. O'Keefe CAPT
MLCLANT (6)

Reply to: (tp-1)
Attn of: Ernestine Cook
(757) 628-4051

To: CGC MATAGORDA (WPB 1303)

Subj: VISUAL TEMPEST INSPECTION OF USCGC MATAGORDA (WPB 1303)

Ref: (a) DON IA PUB 5239-31 Information Assurance Shipboard Red/Black Installation
Publication
(b) NSTISSAM TEMPEST 2-95 Red/Black Installation Guidance

1. Mr. Timothy Neary of ESU Miami conducted an inspection of the Secure Electrical Information Processing System (SEIPS) onboard CGC MATAGORDA on 3 August 2005. The inspection was conducted as required by references (a) and (b). A summary of corrected discrepancies is listed in enclosure (1). No new discrepancies were found.

2. This summary provides a record of the installation at the time of inspection. Modifications or changes to the SEIPS shall not be made without approval of TISCOM (isd-3b) or MLCA. This summary and amendments to this summary shall be retained in the unit's SEIPS TEMPEST documentation file.

#

Enclosure: (1) Visual TEMPEST Inspection Report

Copy: LANTAREA
TISCOM (isd-3b)
ESU Miami
ESD Key West

ENCLOSURES(3)

Visual TEMPEST Inspection Summary

USCGC MATAGORDA (WPB 1303)
3 August 2005

This Visual TEMPEST Inspection is for the FTA Visit

The entire Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. Electronic space
2. Bridge

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

- | | |
|-----|---|
| SF | Correction of the discrepancy is within the capability of ship's force. |
| IAC | Correction of the discrepancy was completed by ships force prior to completion of inspection visit. |
| IA | Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy. |
| IAC | Indicates that an industrial activity corrected the discrepancy. |
| SA | Indicates that the assistance of a support activity is probably required to properly correct the discrepancy. |
| SAC | Indicates that a support activity corrected the discrepancy. |
| CA | Indicates that the Contractor Activity is probably required to properly correct the discrepancy. |

Column C: Reference of the paragraph in designated manuals to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

Enclosure (1)

Discrepancies and Corrective Action Report

1. Electronic Space:

A	B	C	Narrative
01	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2a/pg16 para 5 IA Pub 5239-31 A.1.1.1 a, b	Cabinet 3: Black RF transmitter (RT-1794) in same rack as Red Processors. Recommend moving 3 meters away or in adjacent Black Equipment Room. Recommend placing entire ARC-210 system on Bridge. Waived.
02	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2b	Cabinet 3: Red processor less than one meter away from power line to black transmitter (RT-1794 p/o ARC-210). Waived.
03	CA	NSTISSAM TEMPEST 2/95 pg 27 Para 2a	Cabinet 3: Red processor less than one meter away from black signal lines connected to RF transmitter (RT-1794). Waived.
04	CA	NSTISSAM TEMPEST 2/95 pg 27 Para 4, Para 4.4.1.1, 4.1.1.2 IA PUB 5239-31 Para A.1.7.1 IA PUB 5239-31 MIL-STD 188- 124B Para 5.2.12	Signal cable used with RED processors, BLACK processors, ISDN telephones are not terminated. Red data cables for RED LAN have aluminum/mylar shielding. Manufacturer data: DRAKA COMTEQ (F) ShipLan Cable 4PR 24 AWG Screened 307650. Subject cable may pose a TEMPEST hazard. B.1.2.5 (5239): Approved cables. Mil-C-17 (ref k), or MIL-C-915 (reference(l)), MIL-C-24640(reference(n)) or MIL-C-24643 (reference (o)). Researched cable and found that it does NOT meet any of the above MIL-SPECs. Draka sells data cables that are MIL-DTL-24643 compliant. Subject cables are CAT 5e Shiplan '59W' , '59' and '59S' Marine data cables. The cables listed all have a braided shield in addition to the aluminum mylar tape. The braided shield allows for a flexible ground. NSTISSAM 2-95: RED processors meeting the requirements of NSTISSAM TEMPEST/1-92 (Levels I, II, or III) must use optical or shielded wire cables if specified as part of the manufacturer's installation specification, or if specified for compliance with TEMPEST certification. Paragraphs 4.4.1.1, and 4.1.1.2 defines cable characteristics and shield termination. IA Pub 5239-31: RED Shielded Metallic Wire Cable. RED metallic wire cables in all locations shall be shielded, with the exception of desktop computer cables that are provided by the manufacturer, where there is not an offered shielded cable option. This requirement is not applicable to RED fiber optic cables. MIL-STD-188 "Foil shields are not acceptable for peripheral bonding and do not provide mechanical durability" IA Pub 5239-31 pg B-9 Para d. Note: "If both ends of the cable will not have the shield taken to ground, approval by the cognizant CTTA should be obtained prior to installation." Other source (AFMAN33-214V2 DATED 21SEP2001) states that foil shielding is intended for voice or digital signals less than 5Kbps. CG must assume risks associated with using subject cable. This is also documented in Instrumented Test Report. Acceptable risk. No discrepancy.

05	CA	NSTISSAM TEMPEST 2-95 pg 28 Para 6	RED processors and RF transmitters in Cabinet 3. RED processors should not be powered from the same circuits as RF transmitters. Waived.
06	CA	IA Pub 5239-31 Para B.1.2.6.10	AN/UPX-28 has flexible ground strap with crimped ends. Replace with Class C bond strap. Corrected.
07	CA	IA Pub 5239-31	On racks, install ground cables per IA 5239-31. Where required, use soldered connectors vice crimping. Waived.
08	CA	IA Pub 5259-31	Remove external tooth washers on ground connectors to cabinets. Use lock washers and lug nuts per IA Instruction 5239-31 Figure B-5. Corrected
09	CA	IA Pub 5239 B.1.2.6.12	Keyboard and Monitor in Cabinet #1 has non-manufacturer supplied power cable. Bond shelf to rack. Contends it is manufacturer's cable. Waived.
10	CA	NSTISSAM 2-95 Para 3 Notes 3	RED/BLACK cable separation. Two inch minimum separation requirement. Six inch separation requirement for RED/BLACK cables that run in parallel for 100 ft runs. The only way to ID is via cable tags. Waived.
11	CA	IA Pub 5239-31 Para B.1.2.6.10	Remove flexible ground strap with crimped ends from ANDVT rack and replace with Class C solid. Strap. Corrected.
12	CA	IA Pub 5239-31 Para A.1.1.7.	ARC-210 Secure voice cables. Transmit and receive audio lines need to be shielded. Resolved. See 2. Bridge item #4.
13	CA	NSTISSAM 2-95 Recommendation I Pg 27 Para 3 Notes: 2	Operator position in Classified C4ISR room has cables from two UNCLAS LAN and three CLASSIFIED LAN connections. Require 2 inch (5 cm) separation. Waived.

2. Bridge:

01	CA	NSTISSAM 2-95 Recommendation I Pg 27 Para 3 Notes: 2	LAN (RED) and GPS (BLACK) use common junction box. No RED/BLACK separation. Corrected, moved BLACK LAN and GPS to separate junction boxes. RED LAN is routed in common cable run. Does not have minimum separation. See item #10.
02	CA	IA Pub 5239-31 Para B.1.2.6.13	No metal-to-metal contact for ground strap from ARC 210 Tray to ground on shelf. Recommend use SOLID Class C ground strap vice crimped wire. Corrected.
03	CA	IA Pub 5239-31 A.1.1.7.2a	Not clear if Shielded Twisted Pair is used for voice and control wirelines. SPAWAR will inspect and test during Instrumented TEMPEST test. NOTE: No discrepancy noted by SPAWAR testing. Reference to ARC-210. Informed by Harris Corp that kit provided included shielding of all RED cables. Corrected.
04	CA	IA Pub 5239-31 Para A.1.1.7.2 Pg A-3	Unshielded cable connected to connector J3 on ARC-210 Tray. Twisted red wires (four) runs to ARC-210 Control head mounted in the forward console of the bridge. This is the Control and Status of the ARC-210. All data is by channel/mode/power only, no audio is routed to the Control head. Replace cable run with proper cable. This cable should be shielded. Corrected.

3. Other:

01	CA	NSTISSAM 2-95 Recommendation I Pg 27 Para 3 Notes: 2	CO's cabin. RED and BLACK LAN ports have no cable separation. Recommend 2 inch separation. RED/BLACK cable is tied together. Acceptable risk while underway. No discrepancy.
02	CA	NSTISSAM 2-95 Recommendation I Pg 27 Para 1	CO's cabin. Proposed RED laptop on desk top less than 20 inches (20 cm) from black phone. Acceptable risk while underway. No discrepancy.
03	CA	IA Pub 5239-31 Para A.1.1.7.3.1.b	RED Fiber optic cable goes through space adjacent to black racks that contains hasp for locking. If the cable passes through normally locked spaces (for example, voids, staterooms, etc), that portion of the cable shall be contained in a metallic conduit. This space is the cutters armory and is considered a restricted area. Corrected.

TEMPEST 2/95

Department of the Navy (DoN) Information Assurance (IA) Publication Module 5239-31

MIL-STD-188-124B Grounding Bonding Shielding for Common Long Haul/Tactical Communications Systems

Air Force Manual 33-214, Volume 2, Communications and Information Emission Security Countermeasures Review

U.S. Department of
Homeland Security

United States
Coast Guard



Commander
Maintenance and Logistics Command
Atlantic

300 East Main Street, Suite 700
Norfolk, VA 23510-9103
Staff Symbol: (tp-1)
Phone: (757) 628-4051
Fax: (757) 628-4226
E-mail: Ernestine.N.Cook@uscg.mil

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06.0362

DEC 26 2006

MEMORANDUM

From: *[Signature]*
B. J. O'Keefe, CAPT
MLCLANT (t)

Reply to: (tp-1)
Attn of: Ernestine Cook
(757) 628-4051

To: CGC MONHEGAN (WPB 1305)

Subj: VISUAL TEMPEST INSPECTION OF USCGC MONHEGAN (WPB 1305)

Ref: (a) DON IA PUB 5239-31 Information Assurance Shipboard Red/Black Installation
(b) NSTISSAM TEMPEST 2-95A Red/Black Installation Guidance
(c) COMDT COGARD Washington DC//CG-62//042137Z Mar 04

1. Mr. Brian Meetze of ESD Miami Beach, LT Jim Cabase of COMDT (CG-623), and ET2 Michael Harrison of ESD Key West conducted a Visual Tempest Inspection (VTI) of the Secure Electrical Information Processing System (SEIPS) onboard CGC MONHEGAN on 2 November 2006. The inspection was conducted as required by references (a) and (b).

2. A summary of minor discrepancies is listed in enclosure (1). No serious TEMPEST hazards were noted; therefore, you may continue normal operations. In accordance with reference (c), discrepancies must be corrected within 90 days. You should contact Ms. Ernestine Cook to schedule a re-inspection. This summary also provides a record of the installation at the time of inspection. Modifications or changes to the SEIPS shall not be made without approval of TISCOM (isd-3b) or MLCLANT.

3. This summary and amendments to this summary shall be retained in the unit's SEIPS TEMPEST documentation file.

#

Enclosure: (1) Visual TEMPEST Inspection Summary

Copy: COMDT (CG-623)
LANTAREA
TISCOM (isd-3b)
ESU Miami
ESD Key West

Visual TEMPEST Inspection Summary

USCGC MONHEGAN (WPB 1305)
2 November 2006

This Visual TEMPEST Inspection is for the FTA Visit.

The entire Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. Electronic space
2. Bridge
3. Other

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

Waived	Discrepancies granted a waiver as a result of instrumented testing and per TISCOM ltr of 12 Jul 05.
SF	Correction of the discrepancy is within the capability of ship's force.
IAC	Correction of the discrepancy was completed by ships force prior to completion of inspection visit.
IA	Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy.
IAC	Indicates that an industrial activity corrected the discrepancy.
SA	Indicates that the assistance of a support activity is probably required to properly correct the discrepancy.
SAC	Indicates that a support activity corrected the discrepancy.
CA	Indicates that the Contractor Activity is probably required to properly correct the discrepancy.

Column C: Reference of the paragraph in designated manuals to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

Enclosure (1)

Discrepancies and Corrective Action Report

1. Electronic Space:

A	B	C	Narrative
01	Waived	NSTISSAM TEMPEST 2/95A PG 27 Para 2a/pg16 para 5 IA Pub 5239-31 A.1.1.1 a, b	Cabinet 3: Black RF transmitter (RT-1794) in same rack as Red Processors. Recommend moving 3 meters away or in adjacent Black Equipment Room. Recommend placing entire ARC-210 system on Bridge.
02	Waived	NSTISSAM TEMPEST 2/95A PG 27 Para 2b	Cabinet 3: Red processor less than one meter away from power line to black transmitter (RT-1794 p/o ARC-210).
03	Waived	NSTISSAM TEMPEST 2/95A pg 27 Para 2a	Cabinet 3: Red processor less than one meter away from black signal lines connected to RF transmitter (RT-1794).
04	Waived	NSTISSAM TEMPEST 2/95 pg 28 Para 6	RED processors and RF transmitters in Cabinet 3. RED processors should not be powered from the same circuits as RF transmitters.
05	CA	NSTISSAM 2-95A Para 3 Notes: 3	RED/BLACK cable separation. Two inch minimum separation requirement. Six inch separation requirement for RED/BLACK cables that run in parallel for 100 ft runs. The only way to ID is via cable tags.
06	CA	IA Pub 5239-31 Para A.1.1.7.	ARC-210 and ANDVT Secure voice cables. Transmit and receive audio lines need to be shielded.
07	CA	NSTISSAM 2-95A Recommendation I Pg 27 Para 3 Notes: 2	Operator position in Classified C4ISR room has cables from two UNCLAS LAN and three CLASSIFIED LAN connections. Require 2 inch (5 cm) separation.
08	CA	IA 5239-31 Para A.1.1.7.2.a.	Outer shield missing on KIV-7 db connector.
09	Waived	IA 5239-31 Para B.1.2.6	Cabinet 1: Not grounded properly to ship's hull (i.e. Spring coils do not constitute a Class C bond).
10	Waived	IA 5239-31 Para B.1.2.6	Cabinet 2: Not grounded properly to ship's hull (i.e. Spring coils do not constitute a Class C bond).
11	Waived	IA 5239-31 Para B.1.2.6	Cabinet 3: Not grounded properly to ship's hull (i.e. Spring coils do not constitute a Class C bond).
12	CA	IA 5239-31 Para B.1.2.6	KG-175/TACLANE in Cabinet 3 missing grounding hardware.

2. Bridge:

01	Waived	NSTISSAM 2-95A Recommendation I Pg 27 Para 3 Notes: 2	LAN (RED) cable is routed in conjunction with common cable run. No RED/BLACK separation.
02	CA	IA 5239-31 Para B.1.2.6	Starboard KITE 1: Replace ground wire with Class C bonding.
03	CA	NSTISSAM 2-95A Pg 30 Para 4.4.1	Starboard KITE 1: Cable shielding not grounded at connector (J1).
04	CA	NSTISSAM 2-95A Pg 30 Para 4.4.1	Port KITE 2: Cable shielding not grounded at connector (J1).
05	CA	NSTISSAM 2-95A Recommendation I	Starboard KITE 1: Missing 3 meter separation between RF transmitter and Red processor.
06	CA	NSTISSAM 2-95A Recommendation I	Port KITE 2: Missing 3 meter separation between RF transmitter and Red processor.

3. Other:

01	Waived	NSTISSAM 2-95A Recommendation I Pg 27 Para 3 Notes: 2	CO's and XO's cabin. RED cables of associated LAN drops are routed through a common cable run (i.e. black signal and power lines). Recommend 2 inch separation.
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NSTISSAM TEMPEST 2/95A

Department of the Navy (DoN) Information Assurance (IA) Publication Module 5239-31

U.S. Department of
Homeland Security
United States
Coast Guard



Commander
Maintenance and Logistics Command
Atlantic

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Norfolk, VA 23510-9103
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Phone: (757) 628-4051
Fax: (757) 628-4035
E-mail: Ernestine.N.Cook@uscg.mill

2241
05.0380
OCT 14 2005

MEMORANDUM

From: B. J. O'Seeffe (APT)
MLCLANT (t)

Reply to: (tp-1)
Attn of: Ernestine Cook
(757) 628-4051

To: CGC METOMPKIN (WPB 1325)

Subj: VISUAL TEMPEST INSPECTION SUMMARY OF USCGC METOMPKIN
(WPB 1325)

Ref: (a) DON IA PUB 5239-31 Information Assurance Shipboard Red/Black Installation
Publication
(b) NSTISSAM TEMPEST 2-95 Red/Black Installation Guidance
(c) TISCOM (isd-3b) Memo 2241 of 12 Jul 05
(d) COMDT COGARD Washington DC//CG-62//042137Z Mar 04

1. Mr. Timothy Neary of ESU Miami conducted an inspection of the Secure Electrical Information Processing System (SEIPS) onboard CGC METOMPKIN on 4 August 2005. The inspection was conducted as required by references (a) and (b). Reference (c) cites waivers that have been given and will not be reported. A summary of a minor discrepancy is listed in enclosure (1).

2. No serious TEMPEST hazards were noted; therefore you may continue normal operations. In accordance with reference (d), discrepancies must be corrected within 90 days. You should contact Ms. Ernestine Cook to schedule a re-inspection. This summary also provides a record of the installation at the time of inspection. Modifications or changes to the SEIPS shall not be made without approval of TISCOM (isd-3b) or MLCA.

3. This summary and amendments to this summary shall be retained in the unit's SEIPS TEMPEST documentation file.

#

Enclosure: (1) Visual TEMPEST Inspection Report

Copy: LANTAREA
TISCOM (isd-3b)
ESU Miami
ESD Key West

Visual TEMPEST Inspection Summary

USCGC METOMPKIN
4 August 2005

The entire Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. CIC
2. Radio

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

- | | |
|-----|---|
| SF | Correction of the discrepancy is within the capability of ship's force. |
| SFC | Correction of the discrepancy was completed by ships force prior to completion of inspection visit. |
| IA | Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy. |
| IAC | Indicates that an industrial activity corrected the discrepancy. |
| SA | Indicates that the assistance of a support activity is probably required to properly correct the discrepancy. |
| SAC | Indicates that a support activity corrected the discrepancy. |

Column C: Document Reference to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

ENCLOSURE (1)

Discrepancies and Corrective Action Report

1. CIC:

A	B	C	Narrative
001	SA	IA Pub 5239-31 Para A.1.1.7.3.1.b	RED fiber optic passes through armory, which has a solid metal door. If the cable passes through locked spaces, it shall be contained in PDS. The TISCOM compromise, a mesh door to permit physical inspection, is scheduled to be installed during the next shipyard period.



2241
05.0043

SEP 13 2005

MEMORANDUM

From:  B. J. Keefe, CAPT
MLCLANT (c)

Reply to: (tp-1)
Attn of: Ernestine Cook
(757) 628-4051

To: CGC NUNIVAK (WPB 1306)

Subj: VISUAL TEMPEST INSPECTION SUMMARY FOR USCGC NUNIVAK
(WPB 1306)

Ref: (a) NSTISSAM 2-95 Red/Black Installation Guidance
(b) DON IA PUB 5239-31 Information Assurance Shipboard Red/Black Installation
Publication
(c) COMDT COGARD Washington DC//CG-62//042137Z Mar 04

1. ET2 Timothy Cole of ESD New Orleans conducted an inspection of the Secure Electrical Information Processing System (SEIPS) on CGC NUNIVAK on 7 January 2005. The inspection was conducted as required by references (a) and (b).

2. Enclosure (1) is a summary of minor discrepancies with the SEIPS. No serious TEMPEST hazards were noted; therefore, you may continue normal operations. In accordance with reference (c), discrepancies must be corrected within 90 days. You should contact Ms. Ernestine Cook to schedule a re-inspection. This summary also provides a record of the installation at the time of the inspection. Modifications or changes to the SEIPS shall not be made without the approval of TISCOM (isd-3b) or MLCA.

Subj: VISUAL TEMPEST INSPECTION SUMMARY
FOR USCGC NUNIVAK (WPB 1306)

2241

SEP 13 2005

3. This summary and amendments to this summary shall be retained in the unit's SEIPS (TEMPEST) documentation file.

#

Enclosures: (1) Visual Tempest Inspection Summary
(2) TISCOM (isd-3b) Memo 2241 of 12 Jul 05

Copy: COMDT (CG-6, G-DPM-3)
LANTAREA
TISCOM (isd-3b)
ESU New Orleans
ESD New Orleans
ESU Miami
ESD Key West

Visual TEMPEST Inspection Summary

The entire Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. Radio Room
2. State Rooms
3. Bridge

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

- | | |
|-----|---|
| SF | Correction of the discrepancy is within the capability of ship's force. |
| SFC | Correction of the discrepancy was completed by ships force prior to completion of inspection visit. |
| IA | Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy. |
| IAC | Indicates that an industrial activity corrected the discrepancy. |
| SA | Indicates that the assistance of a support activity is probably required to properly correct the discrepancy. |
| SAC | Indicates that a support activity corrected the discrepancy. |
| CA | Indicates that a Contractor activity is required to correct the discrepancy. |

Column C: Document Reference to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

Enclosure (1)

Discrepancies and Corrective Action Report

1. Radio Room 2-28-O-Q

A	B	C	Narrative
001	IA/SA	IA PUB 5239-31 Paragraph A.1.1.2	The printer (red) uses black power. The printer router (red) uses black power. Recommend plugging printer into UPS.
002	*Waived	NSTISSAM 2-95 Rec I Paragraph 6	There is no 3meter separation between printer (red) and IFF transmitter. Transmitter is enclosed in metal case. Prototype passed RED LAN instrumented test. WAIVED
003	*Waived	NSTISSAM 2-95 Rec I Paragraph 6	In Rack #3, there is no 3meter separation between red and black cables before entering the Marcom switch. Tested and evaluated by SPAWAR previously. WAIVED
004	*Waived	NSTISSAM 2-95 Rec I Paragraph 6	In Rack #3, there is no 3meter separation between cryptographic equipment and RT9000 transceiver. Tested and evaluated by SPAWAR. WAIVED
005	CA	IA PUB 5239-31 Paragraph A.1.1.7.3.1.B	There is not a secure Protected Distribution System (PDS) leaving Radio Room. LE Locker behind Secure Space. Item to be corrected by Contractor. LE locker will have full length locking cage to allow viewing of the subject cables.

Note: Separation of IFF antenna line and Class LAN line may be part of an upcoming GROOM

* Per TISCOM (isd-3b) ltr of 12 Jul 05



2241
05.0382

OCT 27 2006

MEMORANDUM

From:  B. J. O'Keefe CAPT
MLCLANT (t)

Reply to: (tp-1)
Attn of: Ernestine Cook
(757) 628-4051

To: USCGC ATTU (WPB 1317)

Subj: VISUAL TEMPEST INSPECTION SUMMARY OF USCGC ATTU (WPB 1317)

Ref: (a) DON IA PUB 5239-31 Information Assurance Shipboard Red/Black Installation
Publication
(b) NSTISSAM TEMPEST 2-95 Red/Black Installation Guidance

1. Mr. Timothy Neary of ESU Miami conducted a visual TEMPEST inspection of the Secure Electrical Information Processing System (SEIPS) onboard CGC ATTU on 3 August 2005. The inspection was conducted as required by references (a) and (b). A summary of corrected discrepancies is listed in enclosure (1). No new discrepancies were found.

2. This summary provides a record of the installation at the time of inspection. Modifications or changes to the SEIPS shall not be made without approval of TISCOM (isd-3b) or MLCA. This summary and amendments to this summary shall be retained in the unit's SEIPS TEMPEST documentation file.

#

Enclosure: (1) Visual TEMPEST Inspection Summary

Copy: LANTAREA
TISCOM (isd-3b)
ESU Miami
ESD Key West

Visual TEMPEST Inspection Summary

USCGC ATTU (WPB 1317)

3 August 2005

This Visual TEMPEST Inspection is for the FTA Visit

The entire Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. Electronic space
2. Bridge

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

- | | |
|-----|---|
| SF | Correction of the discrepancy is within the capability of ship's force. |
| IAC | Correction of the discrepancy was completed by ships force prior to completion of inspection visit. |
| IA | Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy. |
| IAC | Indicates that an industrial activity corrected the discrepancy. |
| SA | Indicates that the assistance of a support activity is probably required to properly correct the discrepancy. |
| SAC | Indicates that a support activity corrected the discrepancy. |
| CA | Indicates that the Contractor Activity is probably required to properly correct the discrepancy. |

Column C: Reference of the paragraph in designated manuals to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

Enclosure (1)

Discrepancies and Corrective Action Report

1. Electronic Space:

A	B	C	Narrative
01	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2a/pg16 para 5 IA Pub 5239-31 A.1.1.1 a, b	Cabinet 3: Black RF transmitter (RT-1794) in same rack as Red Processors. Recommend moving 3 meters away or in adjacent Black Equipment Room. Recommend placing entire ARC-210 system on Bridge. Waived.
02	CA	NSTISSAM TEMPEST 2/95 PG 27 Para 2b	Cabinet 3: Red processor less than one meter away from power line to black transmitter (RT-1794 p/o ARC-210). Waived.
03	CA	NSTISSAM TEMPEST 2/95 pg 27 Para 2a	Cabinet 3: Red processor less than one meter away from black signal lines connected to RF transmitter (RT-1794). Waived.
04	CA	NSTISSAM TEMPEST 2/95 pg 27 Para 4, Para 4.4.1.1, 4.1.1.2 IA PUB 5239-31 Para A.1.7.1 IA PUB 5239-31 MIL-STD 188- 124B Para 5.2.12	Signal cable used with RED processors, BLACK processors, ISDN telephones are not terminated. Red data cables for RED LAN have aluminum/mylar shielding. Manufacturer data: DRAKA COMTEQ (F) ShipLan Cable 4PR 24 AWG Screened 307650. Subject cable may pose a TEMPEST hazard. B.1.2.5 (5239): Approved cables. Mil-C-17 (ref k), or MIL-C-915 (reference(l)), MIL-C-24640(reference(n)) or MIL-C-24643 (reference (o)). Researched cable and found that it does NOT meet any of the above MIL-SPECs. Draka sells data cables that are MIL-DTL-24643 compliant. Subject cables are CAT 5e Shiplan '59W', '59' and '59S' Marine data cables. The cables listed all have a braided shield in addition to the aluminum mylar tape. The braided shield allows for a flexible ground. NSTISSAM 2-95: RED processors meeting the requirements of NSTISSAM TEMPEST/1-92 (Levels I, II, or III) must use optical or shielded wire cables if specified as part of the manufacturer's installation specification, or if specified for compliance with TEMPEST certification. Paragraphs 4.4.1.1, and 4.1.1.2 defines cable characteristics and shield termination. IA Pub 5239-31: RED Shielded Metallic Wire Cable. RED metallic wire cables in all locations shall be shielded, with the exception of desktop computer cables that are provided by the manufacturer, where there is not an offered shielded cable option. This requirement is not applicable to RED fiber optic cables. MIL-STD-188 "Foil shields are not acceptable for peripheral bonding and do not provide mechanical durability" IA Pub 5239-31 pg B-9 Para d. Note: "If both ends of the cable will not have the shield taken to ground, approval by the cognizant CTTA should be obtained prior to installation." Other source (AFMAN33-214V2 DATED 21SEP2001) states that foil shielding is intended for voice or digital signals less than 5Kbps. CG must assume risks associated with using subject cable. This is also documented in Instrumented Test Report. Acceptable risk. No discrepancy.

05	CA	NSTISSAM TEMPEST 2/95 pg 28 Para 6	RED processors and RF transmitters in Cabinet 3. RED processors should not be powered from the same circuits as RF transmitters. Waived.
06	CA	IA Pub 5239-31 Para B.1.2.6.10	AN/UPX-28 has flexible ground strap with crimped ends. Replace with Class C bond strap. Corrected.
07	CA	IA Pub 5239-31	On racks, install ground cables per IA 5239-31. Where required, use soldered connectors vice crimping. Waived.
08	CA	IA Pub 5259-31	Remove external tooth washers on ground connectors to cabinets. Use lock washers and lug nuts per IA Instruction 5239-31 Figure B-5. Corrected
09	CA	IA Pub 5239 B.1.2.6.12	Keyboard and Monitor in Cabinet #1 has non-manufacturer supplied power cable. Bond shelf to rack. Contains it is manufacturer's cable. Waived.
10	CA	NSTISSAM 2-95 Para 3 Notes 3	RED/BLACK cable separation. Two inch minimum separation requirement. Six inch separation requirement for RED/BLACK cables that run in parallel for 100 ft runs. The only way to ID is via cable tags. Waived.
11	CA	IA Pub 5239-31 Para B.1.2.6.10	Remove flexible ground strap with crimped ends from ANDVT rack and replace with Class C solid. Strap. Corrected.
12	CA	IA Pub 5239-31 Para A.1.1.7.	ARC-210 Secure voice cables. Transmit and receive audio lines need to be shielded. Resolved. See 2. Bridge item #4.
13	CA	NSTISSAM 2-95 Recommendation 1 Pg 27 Para 3 Notes: 2	Operator position in Classified C4ISR room has cables from two UNCLAS LAN and three CLASSIFIED LAN connections. Require 2 inch (5 cm) separation. Waived.

2. Bridge:

01	CA	NSTISSAM 2-95 Recommendation 1 Pg 27 Para 3 Notes: 2	LAN (RED) and GPS (BLACK) use common junction box. No RED/BLACK separation. Corrected, moved BLACK LAN and GPS to separate junction boxes. RED LAN is routed in common cable run. Does not have minimum separation. See item #10.
02	CA	IA Pub 5239-31 Para B.1.2.6.13	No metal-to-metal contact for ground strap from ARC 210 Tray to ground on shelf. Recommend use SOLID Class C ground strap vice crimped wire. Corrected.
03	CA	IA Pub 5239-31 A.1.1.7.2a	Not clear if Shielded Twisted Pair is used for voice and control wirelines. SPAWAR will inspect and test during Instrumented TEMPEST test. NOTE: No discrepancy noted by SPAWAR testing. Reference to ARC-210. Informed by Harris Corp that kit provided included shielding of all RED cables. Corrected.
04	CA	IA Pub 5239-31 Para A.1.1.7.2 Pg A-3	Unshielded cable connected to connector J3 on ARC-210 Tray. Twisted red wires (four) runs to ARC-210 Control head mounted in the forward console of the bridge. This is the Control and Status of the ARC-210. All data is by channel/mode/power only, no audio is routed to the Control head. Replace cable run with proper cable. This cable should be shielded. Corrected.

3. Other:

01	CA	NSTISSAM 2-95 Recommendation 1 Pg 27 Para 3 Notes: 2	CO's cabin. RED and BLACK LAN ports have no cable separation. Recommend 2 inch separation. RED/BLACK cable is tied together. Acceptable risk while underway. No discrepancy.
02	CA	NSTISSAM 2-95 Recommendation 1 Pg 27 Para 1	CO's cabin. Proposed RED laptop on desk top less than 20 inches (20 cm) from black phone. Acceptable risk while underway. No discrepancy.
03	CA	IA Pub 5239-31 Para A.1.1.7.3.1.b	RED Fiber optic cable goes through space adjacent to black racks that contains hasp for locking. If the cable passes through normally locked spaces (for example, voids, staterooms, etc), that portion of the cable shall be contained in a metallic conduit. This space is the cutters armory and is considered a restricted area. Corrected.

TEMPEST 2/95

Department of the Navy (DoN) Information Assurance (IA) Publication Module 5239-31

MIL-STD-188-124B Grounding Bonding Shielding for Common Long Haul/Tactical Communications Systems

Air Force Manual 33-214, Volume 2, Communications and Information Emission Security Countermeasures Review



2241
05.0098

SEP 13 2005

MEMORANDUM

From: *B. J. Keefe*
B. J. Keefe CAPT
MLCLANT (t)

Reply to: (tp-1)
Attn of: Ernestine Cook
(757) 628-4051

To: USCGC VASHON (WPB 1308)

Subj: VISUAL TEMPEST INSPECTION SUMMARY OF USCGC VASHON (WPB 1308)

Ref: (a) DON IA PUB 5239-31 Information Assurance Shipboard Red/Black Installation
(b) NSTISSAM TEMPEST 2-95 Red/Black Installation Guidance

1. ETC David Cooper and ET2 James Bennett of ESD New Orleans conducted an inspection of the Secure Electrical Information Processing System (SEIPS) onboard CGC VASHON on 17 March 2005. The inspection was conducted as required by references (a) and (b). A list of discrepancies is noted in enclosure (1).

2. This summary provides a record of the installation at the time of inspection. Enclosure (2) provides the basis for waiver statements in enclosure (1). Modifications or changes to the SEIPS shall not be made without the approval of TISCOM (isd-3d) or MLCA.

3. This summary shall be retained in the unit's SEIPS (TEMPEST) documentation file.

#

Enclosures: (1) Visual Tempest Inspection Report
(2) TISCOM (isd-3b) Memo 2241 of 12 Jul 05

Copy: COMDT (CG-6, G-DPM-3)
LANTAREA
TISCOM (isd-3b)
ESU New Orleans
ESD New Orleans

Visual TEMPEST Inspection Summary

The entire Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. Radio Room
2. State Rooms
3. Bridge

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

SF Correction of the discrepancy is within the capability of ship's force.

SFC Correction of the discrepancy was completed by ships force prior to completion of inspection visit.

IA Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy.

IAC Indicates that an industrial activity corrected the discrepancy.

SA Indicates that the assistance of a support activity is probably required to properly correct the discrepancy.

SAC Indicates that a support activity corrected the discrepancy.

Column C: Document Reference to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

ENCLOSURE (1)

Discrepancies and Corrective Action Report

1. Radio Room 2-29-2-Q

A	B	C	Narrative
001	WAIVED	NSTISSAM 2-95 Rec I Paragraph 1.A	The printer (red) is closer than 1 M to black IFF power lines. Waived as result of Instrumented Test on prototype.
002	WAIVED	NSTISSAM 2-95 Rec I Paragraph 2.A	The printer (red) along with Classified LAN line runs parallel with IFF transmitter antenna line. There is no separation of these lines. Waived as result of Instrumented Test on prototype.
003	WAIVED	NSTISSAM 2-95 Rec I Paragraph 6	There is no 3-meter separation between printer (red) and IFF transmitter. Waived as result of Instrumented Test and IFF metal enclosure.

2. State Rooms 1-16-1-L/1-16-2-L

A	B	C	Narrative
001	WAIVED	NSTISSAM 2-95 Rec I Paragraph 2.A Note 2	RED LAN Line is in same distribution panel with RF transmission lines. Waived as result of Instrumented Test on prototype.

3. Bridge

A	B	C	Narrative
001	WAIVED	NSTISSAM 2-95 Rec I Paragraph 2.A Note 2	RED LAN Line is in same distribution panel with RF transmission lines. Waived as result of Instrumented Test on prototype.



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06.0042

MAR -2 2006

MEMORANDUM

From: B. J. O'Keefe, CAPT
MLCLANT (U)

Reply to: (tp-1)
Attn of: Ernestine Cook
(757) 628-4051

To: COMDT (G-DPM-3)

Subj: VISUAL TEMPEST INSPECTION FOR USCGC MANITOU (WPB 1302)

Ref: (a) NSTISSAM TEMPEST 2-95 Red/Black Installation Guidance
(b) DON IA PUB 5239-31 Shipboard Red/Black Installation
(c) COMDT COGARD Washington DC 042137Z Mar 04

1. ITC Kevin Priddy and ELC2 David Beaver of ESU St. Louis conducted a Visual TEMPEST Inspection (VTI) of the Secure Electrical Information Processing System (SEIPS) onboard CGC MANITOU on 23 January 2006. The inspection was conducted as required by references (a) and (b). A summary of minor discrepancies is listed in enclosure (1).

2. No serious TEMPEST hazards were noted; therefore you may continue normal operations. In accordance with reference (c), discrepancies must be corrected within 90 days. You should contact Ms. Ernestine Cook to schedule a re-inspection. This summary also provides a record of the installation at the time of inspection. Modifications or changes to the SEIPS shall not be made without the approval of TISCOM (isd-3b) or MLCA.

3. This summary and amendments to this summary shall be retained in the cutter's SEIPS TEMPEST documentation file.

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Enclosure: (1) Visual TEMPEST Inspection Summary

Copy: COMDT (CG-6)
TISCOM (isd-3b)
LANTAREA
ESU St. Louis
ESU New Orleans
ESU Miami
CGC MANITOU

Visual TEMPEST Inspection Summary

CGC MANITOU

The Secure Electrical Information Processing System was inspected.

List of spaces with secure processing equipment inspected by the visual TEMPEST inspector:

1. Radio Room (Secure space)
2. State Rooms (Port & Starboard)
3. Bridge

Discrepancy form legend:

Column A: Sequential discrepancy number

Column B:

SF Correction of the discrepancy is within the capability of ship's force.

SFC Correction of the discrepancy was completed by ships force prior to completion of inspection visit.

IA Indicates that the assistance of an industrial activity is probably required to properly correct the discrepancy.

IAC Indicates that an industrial activity corrected the discrepancy.

SA Indicates that the assistance of a support activity is probably required to properly correct the discrepancy.

SAC Indicates that a support activity corrected the discrepancy.

CA Indicates that a Contractor activity is required to correct the discrepancy.

Column C: Document Reference to which the installation does not conform.

Narrative: A brief description of the discrepancy found.

Enclosure (1)

Discrepancies and Corrective Action Report

1. Radio Room (Secure Space) 2-29-2-Q:

A	B	C	Narrative
001	WAIVED	NSTISSAM 2-95 Rec I Paragraph 1.A	Red printer less than 1M separation from IFF transmitter.
002	CA	NSTISSAM 2-95 Rec I Paragraph 2.A Note 2	Classified LAN in same wire bundle as black signal cables.
003	IAC	NSTISSAM 2-95 Paragraph 4.9.6	Commercial Television cable entering a secure space requires use of an amplifier/attenuator at the entry point of the space to provide one way filtering of electronic signals. Corrected. Filter is in rack.
004	WAIVED	NSTISSAM 2-95 Rec I Paragraph 2.A	The printer (red) along with Classified LAN line runs parallel with IFF antenna line. There is no separation of these lines.
005	WAIVED	NSTISSAM 2-95 Rec I Paragraph 1.B	There is no 1 meter separation between printer (red) and IFF transmitter RF cable.
006	WAIVED	NSTISSAM 2-95 Rec I Paragraph 1.B	There is no 1 meter separation between printer (red) and IFF transmitter black power line.

2. State Rooms 1-16-1-L/1-16-2-L:

001	CA	NSTISSAM 2-95 Rec I Paragraph 2.A Note 2	Classified LAN lines are run with BLACK wire lines (no 5 centimeter separation).
002	CA	NSTISSAM 2-95 Rec I Paragraph 2.B Note 2	Classified LAN lines are run with 120VAC power lines (no separation).
003	CA	NSTISSAM 2-95 Rec I Paragraph 2.A	Class LAN box located adjacent to BLACK LAN box.

3. Bridge 03-14-01:

001	CA	NSTISSAM 2-95 Rec I Paragraph 1. A & B	RED processor less than 1 meter from BLACK power lines and BLACK equipment. KITE-1 handset (2 each) physically cannot separate the lines. KITE-1 is an integrated remote hand set for RED and BLACK equipment.
002	CA	NSTISSAM 2-95 Rec I Paragraph 1. A	Less than 1 meter of separation between RED processor and BLACK equipment on STBD side.
003	CA	NSTISSAM 2-95 Rec I Paragraph 1. B	Less than 1 meter of separation between RED processor and BLACK wire lines on STBD side.
004	CA	NSTISSAM 2-95 Rec I Paragraph 1.A	Less than 1 meter of separation between RED processor and BLACK power on STBD side.
005	CA	NSTISSAM 2-95 Rec I Paragraph 2. B	Less than 5 centimeters of separation between RED wire line and BLACK wire line on STBD side.

Mr. Mark Rupprecht
Code 70B/x3150
13 APR 07

Issue: Request for clarification on COTF 27 APR 05 Letter: Update of the 123 Foot Patrol Boat Operational Assessment Analysis (OAA) of 29 SEP 04. E-mail from LCDR Shue requesting clarification.

Background: At the request of the USCG (COMDT COGARD 101705Z MAR 05), COMOPTEVFOR provided an update to the initial OAA that reviewed 20 issues assessed as greatest risk to a successful Operational Evaluation. The update was conducted between 11 March and 5 April 2005. It was based upon underway observations of USCGC MATAGORDA and USCGC PADRE as well as visits to USCG Sector Key West and cutters METOMPKIN and NUNIVAK in port.

Discussion: Paragraph 1.4 of the OAA Update Matrix focused on the installation of equipment, software, and certifications required for the exchange of the Common Operational Picture (COP) in a secure environment. The Navy's SPAWARSSCOM evaluates whether Naval/Coast Guard systems meet the minimum requirements to connect to DOD classified networks. The USCG designated authority then uses that information in determining whether to issue an Interim Authority to Operate (IATO). An IATO is granted when sufficient measures have been taken to prevent unauthorized access to a C4 system. This is based on the cumulative result of physical equipment installations, required inspections (e.g. TEMPEST, Communications Security (COMSEC), etc.), doctrine, documentation, functionality, and training. At the time of the update, several positive events were noted. TEMPEST discrepancies (bonding and cabling) and COMSEC discrepancies (classified space physical access) were corrected in USCGC MATAGORDA. In addition, the requisite software had been loaded. However, there were unresolved installation discrepancies which precluded a SPAWARSSCOM recommendation for USCG (CG-62) to release an IATO. Without the IATO, cutters were not authorized to transmit and receive classified information, significantly limiting their participation in USCG tactical operations.

The comments in paragraph 1.10 pertain to the Connectivity Critical Operational Issue (COI) (the ability to send data to/from the cutter). The cutter's ability to obtain satisfactory TEMPEST inspection reports and COMSEC certifications was a significant milestone. A satisfactory TEMPEST report is granted by an accredited TEMPEST inspector when sufficient physical measures (equipment positioning and protection) are taken to prevent unauthorized electronic emanations.

The corrections made in MATAGORDA were reported as installed in the follow-on cutters (PADRE and METOMPKIN) via USCG message traffic and email, leading COMOPTEVFOR to observe that the remaining cutters should be capable of meeting the standards. In spite of this progress, physical connectivity was still assessed as high risk, based upon the inability to establish and maintain classified two-way data exchanges with other USCG and Naval vessels.

Recommendation: None. For Information Only.