

46<sup>th</sup> Edition - December 2018

# CAKAP TAKTIK

# MARITIM

PUSTAKMAR



“HE WHO COMMANDS THE SEA  
HAS COMMAND OF EVERYTHING”

-Themistocles-

COMMAND  
EDITION







EVERYTHING  
IN WAR  
IS  
VERY SIMPLE.



**BUT**  
**THE SIMPLEST**  
**THING IS**  
**DIFFICULT.**





**CAKAP TAKTIK  
MARITIM**  
46<sup>th</sup> edition  
December 2018

**PATRON**

*Cdr Harisundar Rajoo RMN*

**CHIEF EDITOR**

*Cdr Mohd Irwan bin Che Mohd Rani RMN*

**EDITORIAL**

*LCdr Chris Watson RAN*

*Lt Mohamad Hanif bin Ahmat Amin RMN*

**DESIGN**

*Lt Cdr Mutalib bin Ismail RMN*

*Lt Mohamad Hanif bin Ahmat Amin RMN*

**CONTRIBUTORS**

*Capt Abdullah Sani bin Ismail RMN*

*Capt Ivan Mario Andrew RMN*

*Cdr Mohamad Sham bin Saimon RMN*

*Cdr Ahmad Nazim bin Salimin RMN*

*Cdr Mohammed Noorsyarizal bin*

*Mohammed Noordin RMN*

*Lt Cdr Sujiestheran a/l Suparmaniam RMN*

*Lt Cdr Lim Kim Tat RMN*

**EDITORIAL AND PUBLISHING  
OFFICE**

*Research and Development Department,*

*PUSTAKMAR*

*Pangkalan TLDM 32100*

*LUMUT*

*Tel: +6056817868*

*Email: pustakmar@navy.mil.my*

**TACTICAL AND STRATEGIC  
CONTRIBUTION**

*The wider Naval warfare community is strongly encouraged to submit articles to this publication on issues relating to maritime warfare, which are tactical in nature. To ensure the maximum number of articles you are requested to write about 1000 words. Illustrations are most encouraged. Contact the Editorial Team for advice at Tel: 05-6817853 or Fax: 05-6817868*

**WELCOME** to the 2018 edition of CAKAP TAKTIK MARITIM. This 46<sup>th</sup> edition is an exclusive one containing a 'Command Perspective' and authored by Commanding Officers of the Royal Malaysian Navy. The contributions from Lumut based COs provide a unique view from their positions and it is hoped these interesting articles will be enlightening and professionally stimulating.

The Italian Philosopher, Galileo Galilei said 'You cannot teach a man anything. You can only help him discover it within himself'. In a similar manner in PUSTAKMAR this year has been spent helping to strengthen the Western Fleet's warfare skills and we are continuing to make progress. Despite prudent budgeting, we have still managed to conduct effective programs such as *Bengkel Kajian Doktrin Peperangan, Bengkel Peperangan, Ceramah Maritim* and *Bengkel Pegawai Kanan* is still progressing as scheduled in order to improve our related doctrine. We are responsible for the conduct of eight Basic Tactical Training, two Command Team Training and Integrated Team Training events for the Regional Commands every year. They contribute to honing the Fleet's ability to maintain and improve warfare knowledge and skills.

As we are heading towards '15 to 5' transformation, we are aware of the challenges that lie ahead. With a highly professional and motivated workforce, PUSTAKMAR, as part of Operational Readiness Headquarters, will continue to provide the best return on investment for the Royal Malaysian Navy. I am grateful for the support from all the contributors to this edition in a year which has seen many changes, including the establishment of the RMN's Sea Power Centre in Kuala Lumpur.

**"Strive for victory"**



# small **BUT POTENT** : The **ROYAL MALAYSIAN NAVY** Strategies Toward **SUPERIOR NAVY** AGGRESSION

**Capt Abdullah Sani bin Ismail RMN**

As a small and developing nation, Malaysia aims to maintain its relevancy in international relations, particularly when it involves the U.S. and China, by being neutral and not coerced while maintaining an independent foreign policy. While a small and humble naval force, the Royal Malaysian Navy (RMN) has the capability to challenge the great navies who intend to conduct maritime offensive operations towards Malaysia's maritime interests and sovereignty. With its clear, feasible mission statement, the RMN, though with a modest budget, is able to challenge superior navies by implementing strategies favorable to them. The first strategy is by adopting a sea-denial strategy. This asymmetrical strategy is vital in searching for comparative advantages while trying to avoid a decisive and stalemate battle with a superior navy. The second strategy is by implementing its 15 to 5 Fleet Transformation Program. This innovative program will enable the RMN to gain initiatives and advantages such as commonality, advanced weaponry and self-reliance. The commonality will ensure the principle of simplicity within its force while self-reliance will drive RMN survivability in naval warfare. The third strategy is the RMN's capability in performing joint operations with its sister service, the Royal Malaysian Air Force (RMAF), particularly in maritime strike operations. The RMAF, with its fleet of potent and lethal Fighter Ground Attack (FGA) from various manufacturers, are capable of delivering deadly maritime strikes which adds another missile strike option to the naval force. The scattered location of its airfields, both on the main lands and small islands, potentially brings the element of surprise attack and will further challenge an adversary. By implementing a sea denial strategy combined with innovations and integrated joint operations, the RMN can pose an asymmetric challenge to stronger navies that may threaten Malaysia's maritime resources and interests.

## **BACKGROUND**

Malaysia is a maritime nation. Malaysia is geo-strategically located in the middle of a world trading hub and is dependent on seaborne trade which contributes to ninety percent of its economy. This factor is obvious whereby Malaysia is located between one of the world's busiest straits, the Strait of Malacca and the world's most disputed sea, the South China Sea (SCS). The Strait of Malacca is the main artery for world trade whereby 100,000 plus vessels ply through this strait every year while it is estimated that 15.2 million barrels of crude oil pass through the SCS per day via the Malacca Strait. Furthermore, the SCS provides the main source of protein to the people of Southeast Asia and its richness in hydrocarbons contributes to the development of Malaysia's economy. A second factor can be seen whereby ninety percent of Malaysia's trade is seaborne and there are seven international ports scattered throughout Malaysia. Realizing that seaborne trade is her economic life blood, Malaysia has taken the initiative in setting up its commercial shipping line known as Malaysia International Shipping Corporation (MISC). This has grown into one of the world's largest shipping operators and the second largest global shipping company by market capitalization. These factors demonstrate powerfully that Malaysia is a maritime nation and its importance has attracted attention from the various great powers that tend to exert their influence in the region.

Among them, China has expressed its interest in the region, and this can be traced back to the ancient Ming dynasty in the 14<sup>th</sup> century. Admiral Zheng He, a Chinese admiral, led an expedition to expand the dynasty trade to Southeast Asia and other empires around the Indian Ocean. This expedition was known as Peace and Friendship with the purpose to establish diplomacy and trade. The convoy consisted of between 50 and 250 ships with 20,000 armed troops.

A few analysts argue that this expedition was to exert gunboat diplomacy whereby the Chinese admiral further established a garrison in Malacca to control the Malacca Straits in 1405. Contemporarily, this interest was expressed in 2013 by former President of the Republic of China (PRC), Hu Jintao, when he expressed the importance of the control of the Malacca Straits in his “Malacca Dilemma” thinking. He stressed the importance of ensuring the uninterrupted flow of raw materials from the Persian Gulf and Africa to feed the industrial hunger in Mainland China. The PRC interest in Malaysia’s surrounding waters has been further in evidence when it strengthened its nine-dash line claim in the SCS on a historical basis. The claim was observed as a unilateral move and was further worsened with reclaiming activities by China with the installment of lethal and offensive characteristics of military assets. This move can be assessed as a two-fold strategy: An ‘Anti Access and Area Denial’ (A2AD) asymmetric strategy against the superior U.S. Navy (USN) and a local sea control strategy against claimants which pose little threat to the People Liberation Army-Navy (PLA-N). In addition, PLA-N military activity has become a powerful driver whereby incrementally, the USN and the presence of other modern navies in these waters has increased to challenge China’s claim.

The increased tempo of blue water navies appearing in these waters potentially creates friction and this view was supported by the naval analysts, Professor Holmes and Yoshihara from the U.S. Naval War College (USNWC). Both observed the effect of a cramped space on the western Pacific coastline and with other geo-strategic considerations, it is unlikely for two world class powers to be contained and confined within the first island chain. Additionally, the U.S. consistency in pursuing its Freedom of Navigation Operations (FONOPS) since 1979 has not been widely accepted by certain nations as they view this as a modern form of gunboat diplomacy. This operation, which frequently occurs in the South China Sea, is targeted at the PLA-N, and sometimes has had a significant affect on other stakeholders like Malaysia. The risk of miscalculation and resulting provocations increases the more frequently these two great navies encounter each other within the narrow seas of Malaysia’s contiguous zone and Exclusive Economic Zone (EEZ). This, directly and indirectly, exposes Malaysia’s boundaries which in turn threatens its sovereignty. Kuala Lumpur has

increased its suspicion over the increased great powers’ military presence and related activities within its EEZ. Should conflict arise, the risk to Malaysia and its neighbors’ boundaries becoming an area involved is significant, thus affecting Malaysia’s economy and foreign policy. It is imperative for Malaysia to understand the need to gain protection from external attack which is feasible through military force and goes hand-in-hand with highly trained diplomacy.

## Sea-Denial Strategy

The RMN can adopt a sea denial strategy to mitigate the gap in force and space factors to challenge superior navies within its waters. This strategy has been chosen by smaller navies to challenge and dispute command of superior navies whose intent to exercise sea control. The idea of implementing a sea denial strategy for the small navy was supported by naval thinkers stating that the small and coastal navy does not have to be a sea power in exercising its role and mission within its domain. This strategy has been chosen mostly by smaller coastal navies with limited defense budgets whereby the nation’s economy dictates the budget and development. The RMN can be grouped under this category whereby its development has increased gradually in parallel with its national economic status.

Sea denial can be defined as the ability of one’s navy to deny the use of the sea partially or completely by the enemy for military and commercial purpose. Although the great naval thinker Milan Vego stated that this is the principal objective of an inferior navy, it is arguable that this strategy can be adopted by a powerful navy as well, depending on the situation. Nevertheless, the RMN, in this context as an inferior navy, may exert this strategy with several methods which suit its current capabilities and its domain. The methodologies that RMN can implement are avoiding decisive naval battles and control of one or multiple choke points.

Avoiding a decisive naval battle is vital for the RMN, ensuring its fleet is active in being until the situation develops or is favorable to her side. One of the prerequisites for the superior navy to exercise sea control is through the destruction of the inferior force via a decisive battle. The stronger navy enjoys several initiatives of operational factors and functions such as the initiative in selecting the time to initiate an

attack and greater firepower from a stand-off distance, beyond the effective range of the RMN defenses. Furthermore, a lethal attack can be launched against the RMN bases. Shall this situation happen, the RMN will lose its capability to contest the superior navy. Thus, to avoid being defeated, the RMN must actively anticipate its potential enemy activities. Operationally, this is possible via the operational function of intelligence and the sound tactic of scouting.

Scouting is important as it contributes to the effective attack. As a small naval force with a modest budget, the RMN must strictly adhere to one of the principles of war, the economy of force. The RMN is constrained by its amount of ammunition, particularly missiles and torpedoes. Therefore, its attack must be precise and lethal. Thus, the targeting information must be precise as a prerequisite to launch an attack, and this is possible with excellent scouting. To implement good scouting, the RMN enjoys the advantages of operational factors in terms of space whereby the helpful geography such as the narrow Straits of Malacca and the South China Sea are favorable for them. Its shorter distance to its coast will enable the various radar and observation stations to better conduct surveillance and reconnaissance particularly in the Recognized Maritime Picture (RMP). Furthermore, by exploiting and taking advantage of the high traffic density, the RMN can deploy its small naval force to disguise itself as a neutral vessel, or it may deploy another unsuspected vessel such as a fishing vessel to provide continuous intelligence and targeting information. This tactical action if implemented in a wide area will lead to another element, superior domain awareness. These two elements; geography and superior domain awareness are two elements for success in naval defense whereby it will assist the RMN in avoiding decisive naval battles that may result in a force fatality.

Another method of sea denial is the denial of control of one or multiple choke points. This method suits the RMN strategy considering its current capabilities and the geographical factors which are favorable to her. The superior navy will ensure the control of various choke points within Malaysian frontiers such as the northern approach to Malacca Straits and approaches from and to the SCS. These will become prerequisites to obtain sea control. The control of choke points would also blockade RMN naval force

movements within certain areas thus preventing the RMN conducting a sea-denial strategy. Furthermore, this action can be carried out by the superior navy with various highly capable assets such as larger combatants, submarines, mines and aircraft. Most of the great navies' assets are superior with regards to range, speed, precision and lethality thus capable of becoming the most effective platforms in conducting the struggle for the control of multiple choke points. Once sea control is established, the superior navy will have the capability to conduct other phases of maritime activities such as shore-projection without being contested.

With sea denial strategy in mind, the RMN must contest and deny the control of its choke points. This strategy can be carried out employing several asymmetrical methods. One of these is by exploiting its comparative advantage whereby the RMN can exploit its strengths and an enemy's weaknesses. The comparative advantages that the RMN can consider is the use of its conventional powered submarine force. The submarine is a classic sea denial weapon and has become the weapon of choice for this purpose. The RMN submarine will exploit its advantages: subsurface capabilities, quietness, compared to nuclear powered submarines and especially the local knowledge of its operating environment. The submarine's stealthy characteristic is vital as it needs to operate independently for a certain periods in the waters dominated by the enemy without being detected. Furthermore, with the combination of its stealth and destructive potential, a submarine presence will create uncertainty and deny the enemy's intention to control a certain area.

In addition, the oceanography characteristics of littoral waters will add complexity and variability affecting the underwater sensor effectiveness. Thus, more efforts are required to detect submarines which will affect the operational factors of space and time. Another factor that potentially creates difficulty and influences the decision-making in ASW is the identification of submarines whereby it is difficult and almost impossible to identify the type and nationality of a submarine particularly when it is submerged. The increased presence of a submarine in this region may contribute to this factor as the surrounding navies have acquired conventional powered submarines. The possibility of misjudging and misidentifying an RMN submarine with another navies' submarine may exist, and if it happens, the

situation may change and become complicated. The superior navy may release its ASW weapon indiscriminately to protect its naval force similarly to the Royal Navy in the Falkland War whereby it fired hundreds of ASW weapons against the threat of one Argentine submarine. The presence of a single submarine may pose a major threat to sea control by a stronger fleet and deny its operations in the area.

Besides submarines, the sea mine is another weapon of choice for denial of choke point control. It has frequently been chosen by inferior navies because it is simple, reliable, lethal and can be deployed by any platform. In a contest against a superior navy, the RMN, as the less capable navy can conduct offensive mining in the bottle neck area or choke point control as the first step for them to exert sea control. Additionally, the RMN will lay mines in its seaport approaches and its surrounding waters as part of defensive mining to prevent the enemy from conducting a blockade. This will assist in countering the enemy's strategy in search for a decisive naval battle. Furthermore, it serves as an anti-amphibious landing defense if an enemy is intent to conduct shore projection. Once a certain area has been mined, an opponent will face the challenge of operational factors in terms of time, space and force. The Mine Counter Measure (MCM) environment is complex and requires substantial and enormous effort to hunt and neutralize almost all types of mines. The peculiarities of bathymetry and peculiar oceanography, sound propagation, characters of the sea bottom and the sensitivity of the sensor used to detect mines are some of the challenges in term of space and force. This will affect the operational decision of a superior fleet who intends to control Malaysian waters.

Although small, the RMN can deliver a heavy blow towards the superior navy by comprehending and executing naval theorist Wayne Hughes' 'Key Cornerstones' presented in Fleet Tactics: Attack Effectively First. The RMN needs to continuously seek for its own comparative advantages and look for the enemy's weaknesses and its critical vulnerabilities. This approach can be refined so that the RMN can make a skillful combination of geographic position and its asymmetric assets such as the submarine, mines and naval missiles to deliver an impactful strike in a narrow sea environment. It is imperative for the RMN to attack effectively first under concentrated firepower and this effort can be

carried out by a tactical attack. Successful tactical attacks also require the element of surprise, thus it is important for the RMN to invest and innovate in superior reconnaissance capabilities. Tactical success is achievable when the implementation of effective first attack can be translated into the operational objective of the RMN. This operational objective will contribute to the political objectives of Malaysia, and it will support a strategic objective of ending the war quickly with help from the international bodies portraying Malaysia as a small nation being bullied by a bigger and stronger nation.

### **Implementation of Innovative 15 to 5 Fleet Transformation Programme**

Being small does not mean an absence of big ideas. The RMN decision to implement its innovative program known as the 15-to-5 Fleet Transformation Program is the best approach to address various challenges in the backdrop of Malaysia's economic constraint. The fiscal challenge is the biggest difficulty which the RMN has to face, and it worsened with the recent 30 percent cut in the defense budget. Realizing the increasing need for the RMN to play its role with very limited allocations, the RMN needs to become very flexible and adaptive to a fast-changing dynamic shift in the security environment. Its 15-to-5 Fleet Transformation Program, an out-of-the box approach, will take advantage of expanding its mission spectrum and enhancing its capabilities. This enhancement of its capabilities is feasible through the incremental number of vessels with commonality of characteristics and self-reliance.

By implementing this idea, the RMN will benefit from the increasing number of hulls with common features without affecting the original budget allocated to the RMN. This is possible as the RMN will reduce its 15 classes of ships from various manufacturers to 5 classes of ships, built mostly by local shipyards. The reduction is assisted by the decommissioning of aging and obsolete assets. This will save on maintenance costs, allowing budgets allocated for the maintenance to be optimized for procurement of new assets. The procurement of newer vessels will emphasize commonality as a priority feature and this will assist the RMN to better conduct its role to fight a war. Common attributes will contribute to the war effort by sharing necessary



information and equipment thus obtaining one of the principles of war: simplicity.

The element of simplicity is crucial for a small navy. The RMN can derive this element from the common characteristics of its future fleets which will assist them to be concise, accurate and flexible in naval planning, execution and decision making. For instance, the commonality features of fleet sensors will contribute to interoperability thus gaining the benefit of information sharing via the fastest means. Important information, such as targeting information, will enable them to attack first effectively, especially when the attack is carried out in the area when the enemy is least expecting it. Furthermore, through synchronization and sequencing of maritime attacks, and with the combination of the element of surprise, the small RMN fleet is capable of delivering a heavy punch to a superior force. As the enemy responds towards the attack, the RMN fleet can initiate another attack at other places to create confusion and leave them in chaos. The creation of another attack is possible with the number of assets which it will disperse to create a better kill probability. Simplicity through commonality will assist the RMN to contest a superior navy and address its gaps in the force element of operational factors. In addition, simplicity will also assist in the elimination or reduction of friction and fog of war. This is possible through a very simple organizational structure and flexible planning. Thus, it is obvious that the simplicity element which is derived from this program will assist the RMN in opposing any superior navy.

This innovative program will potentially exploit another advantage: self-reliance. Self-reliance is instrumental for a smaller navy like the RMN. This will assist them with achieving two factors: ensuring the RMN's momentum to contest superior force independently and strengthening local shipyards and the defence industry. In wartime, due to the vulnerability of Malaysia's long coastlines and the distance from Peninsular Malaysia to East Malaysia, its seaborne trade is likely to be harassed by any superior force by waging war maritime trade. With the implementation of minimal adversary naval actions such as a naval blockade, various Malaysian local industries, including the defense industry, will suffer from the act while Malaysian imports and exports would be disrupted and potentially embargoed. Any foreign assistance to Malaysia is unlikely to be timely and the RMN will have to fight

with whatever assets it owns as well as face the risk of attrition as the war goes on. It can be predicted that by relying on foreign states for the procurement of defence assets, the RMN will probably lose its self-reliance. This situation will worsen if foreign states have an aggressive agenda or place their interests above the RMN's need. Furthermore, through self-reliance, the local industry will minimize this possibility by actively engaging in shipbuilding activity and other defence related matters during peacetime and wartime. The implementation of this program requires engagement with various local shipyards and the defence industry. The planned results are not only limited to shipbuilding but also the development of various high-technology systems such as weapon systems. In addition, the shipbuilding projects will contribute towards Malaysia's macro and microeconomic strength such as assisting and sustaining in the growth of a local defense industry, reducing the outflow of funds overseas and creation of new jobs.

### **Joint Operations with the Royal Malaysian Air Force (RMAF)**

In addition to the sea-denial strategy and the implementation of its transformation program, the RMN should ramp up a joint coordination effort. A joint effort and close service cooperation are significant to winning a war. Vego argues that to obtain sea control, one force must obtain control of all three physical dimensions and part of the coast. He further emphasizes the importance of both the air force and naval force joining efforts to exercise sea control particularly in narrow seas such as the Malacca Strait and certain parts of the SCS. The superior force, with its greater capabilities, owns the initiative and certain advantages to exert sea control. Thus, it is imperative for the inferior force such as the RMAF and the RMN to contest and dispute both the air and sea domain. This is possible through coordinated joint operations with the RMAF particularly from its FGA aircraft which are based in the scattered locations of its airfields.

Contemporarily, coordinated joint operations are one of the modern warfare elements being pursued by military forces. The employment of diverse forces to reach a common objective at all levels will exploit the strength of one's own force and this is possible by an inferior force too. The objective of the inferior force is to disrupt the enemy's freedom of action and



movement via continuous attack and harassment. The RMN and the RMAF are capable of performing this action. They are interoperable and this is evident in their long established mutual understanding for coordinated joint operations as demonstrated with a series of past successful operations and exercises. Local exercises between the RMN and the RMAF such as Operational Sea Training Exercise (OSTEX) and ANGSA Exercises which are being held annually have sharpened the coordination between these two services. These exercises have emphasized the high-tech capabilities of the forces involved such as coordinated missile firing (CMF) and Integrated Air Defense. The focus of this exercise on missile firing capability is imperative. This is because the smaller navy must deliver a heavy punch in one attack and the missile is the best in this role as it is fast, lethal and offensive in nature.

Moreover, the RMN and the RMAF must make full use of its missiles effectively and efficiently. Due to limitations in missile quantity inventories, both services have taken seriously one of the important elements of the principles of war: economy of force. It is unlikely for them to overwhelm the enemy with a missile attack, thus, precision in every missile attack is mandatory and this is possible with a coordinated method of continuous joint exercise and operations. Both services have shown excellent standards in these capabilities. Additionally, the cost of one missile is cheaper, and it is expendable, compared to the cost of a surface asset such as frigate and destroyer. Most importantly, the missile attack will be at a high cost to the enemy, particularly to his High Value Units (HVV). Furthermore, it takes more time to produce a ship with competent crews to fight a battle; this will greatly affect the adversary's operational factors of force, its operational regeneration and operational reserve.

Realizing the missile's susceptibility of being influenced with electronic jamming, the RMN and RMAF have had various types of missiles in its inventory from western nations and the former Soviet-Union bloc. Owning various types of missiles will challenge the adversary to understand a certain type of missile profile, thus complicating their approach for defensive counter-measures. The RMAF particularly is familiar with various avionic and weapon systems and has adjusted and adapted

appropriately to meet its special needs to suit its environment.

The scattered location of the RMAF airfields in Malaysia's geography can pose a significant challenge to its adversary too. In modern day, a fort in narrow seas can be described as a land-based aircraft and coastal batteries may potentially deliver a lethal strike against an enemy's fleet. The scattered location of its airfields, which varies from deep in the jungle to nearby coastal areas, will complicate and challenge the enemy to anticipate the threat axis of the missile attack from the RMAF's FGAs. The airfields' locations deep in the jungle and in the mountainous areas provide good shelter and concealment from enemy attack, thus the RMAF may sustain its operations without being disrupted by enemy harassment. Therefore joint operations with the RMAF will complicate and deny the enemy's intent to exert sea control in Malaysia's waters and enable the RMN to protect Malaysia's maritime resources and interests.

### Counter Argument

Some would argue that, regardless of the RMN strategies, as a small navy with limited capabilities and number of assets, the RMN will be defeated in any naval engagement with the superior force. The adversary's capabilities, particularly in the number and size of surface assets, superior air power, and sustainability will overwhelm the RMN capability to defend itself. The massive number of surface units and air assets with high tech equipment, such as sensors and weapon systems, will deliver the stand-off capability owned by the superior force which will knock out the RMN assets even before the RMN can begin its detection phase. Furthermore, the stand-off capability will further guarantee the enemy's power projection towards Malaysia's mainland. In addition, the enemy, with its superior capabilities, will exert sea control in Malaysia's waters thus strangling Malaysia's economy in which ninety percent of its trade is seaborne trade. This effort will deny Malaysia resources of seaborne trade, thus crippling its economy which will in turn unable them to sustain and survive the war effort. The RMN's approach to conduct the sea-denial strategy will not bring any effect as the RMN assets are small, inferior and vulnerable to neutralization by the enemy.

## Rebuttal

Although the RMN capability is inferior vis-à-vis a superior navy, its geographic position gives Malaysia unique opportunities to implement an asymmetric strategy. This geographic position provides the RMN certain advantages in terms of operational factors such as space and time. The Malaysian geographies are unique whereby its long peninsular coastline, scattered small islands and variable topographies will present significant challenges to its adversary. In addition, due to the variable topographies and geographic features, the enemy will face difficulty when building its air and maritime picture. This difficulty will complicate and limit the adversary's sensors and weapons' maximum effective ranges. This will further disrupt the enemy's layered defense, defense in depth and necessary mutual support, thus exposing its vulnerability to being attacked. Furthermore, due to the proximity with the land, various RMN and RMAF assets such as small size combatants and FGA may exploit the short distance and topographic features to launch a surprise attack

against the enemy's fleet particularly in choke points areas which will deny the enemy sufficient time to counter the threat. In short, the RMN and the RMAF have the advantage of time and space whereby it may choose when and where to strike. This combination of initiative and surprise will contribute to the attack effectively our first cornerstone of naval tactics, which is the critical element for an inferior force. Furthermore, if the RMAF can sustain a continuous air attack, it will potentially attrite down the enemy and shows its efficacy if the attack is carried out against the enemy's critical vulnerabilities. In the Falklands War, if the Argentine Air Force could have prolonged a constant air attack against the Royal Navy (RN), the history of this war would be different. This history would be more interesting if the Argentinian Navy and the Argentinian Air Force had conducted joint operations against the RN. Thus, by a thorough study and learning from this lesson, the RMN is capable of protecting Malaysia's maritime resources and interests against any superior aggression.

## CONCLUSION

The RMN, although inferior, is capable of challenging any great navy threatening its maritime resources and interests with favorable strategies. This is possible with the implementation of the asymmetric strategy by forcing the enemy to fight in situations unfavorable to them. This will exploit the RMN's strengths and simultaneously conceal its weaknesses. On the other hand, the enemy will be forced to adapt to the RMN strategy, thus exposing its own vulnerabilities and weaknesses. The RMN with a sea-denial strategy in mind will implement its fleet-in-being strategy. This is vital and possible through the avoidance of decisive naval battles. The continuous existence of its fleet will ensure the RMN is capable to continuously harass the enemy thus dispute and contest the enemy's intention to exert sea-control in Malaysia's waters. The innovative approach of its 15-to-5 Fleet Transformation Program is vital whereby this program assists the RMN to become very flexible and adaptive to the current environment thus maintaining its relevancy and survivability in peace and wartime. This program also ensures the RMN develops its current assets regardless of Malaysia's economic fluctuation. Finally, joint operations with the RMAF are vital to deliver a punishing attack to the enemy and complicate the enemy's ability to conduct its power projection into Malaysia's waters and the mainland. In conclusion, with the implementation of these three strategies, the RMN is fully capable of challenging the great navies of today and tomorrow, thus protecting its maritime resources and interests.

Captain Abdullah Sani bin Ismail RMN was born on 12<sup>th</sup> of September 1967 in Terengganu. He joined the Royal Malaysian Navy (RMN) as a Cadet Officer at the Officer Training School, KD PELANDOK on the 1<sup>st</sup> of September 1985 upon completing his education at the Royal Military College (1983–1984). He was commissioned as a Sub Lieutenant in Executive Branch of the RMN on the 1<sup>st</sup> of September 1987. Throughout his career, he has secured various onboard and ashore appointments. Captain Sani also attended his Staff Course at Naval War College, United States in 2002 (Intake 61) and was promoted to the rank of Commander on the 1<sup>st</sup> of February 2007 while serving in France.

After completing his Master in National Security Administration (MNSA) Regular Class 49 (RC49) at National Defence College of the Philippines (NDCP) Captain Sani assumed his previous job as Assistant Chief of Staff Operations & Warfare on the 20<sup>th</sup> of October 2014. Currently he is the 23<sup>rd</sup> Commanding Officer of KD LEKIR and Squadron Leader of 22<sup>nd</sup> Corvette Squadron since 21<sup>st</sup> March 2018 and SOA since 24<sup>th</sup> May 2018.

### About The Author





# Should The Planning of The Royal Malaysian Navy Development **FOCUS** ON **REGIONAL SECURITY** OR **BUDGET**

Capt Ivan Mario Andrew RMN

*“balance between short and long term objectives, between financial and non-financial measure indicators and, between internal and external performance”*



Generally, Malaysia has been blessed with a stable democratic environment where it enjoys good alliances with all Asian and Western powers.

Nevertheless, it is like any other country faced with internal, regional and global conventional issues ranging from economics to security. Historical unresolved land and maritime border disputes, domestic instability in this region and the will to exercise international rights has placed Malaysia in a time bomb region about to explode and implode (Razak, 2001).

Accordingly, the RMN has to respond to all these maritime concerns with its existing aging fleet comprising of 15 classes of ships from different vintages (some exceeding 30 years) and which has reached obsolescence supportability issues. Hence, the aspiration of having a balanced and capable fleet has to be planned accordingly either by

focusing on regional security or the available budget.

## AIM

Should the planning of the Royal Malaysian Navy development focus be based on regional security or budget?

## DISCUSSION

### FUTURE RMN DEVELOPMENT FOCUS

The security environment is becoming more dynamic and is categorized as Volatile, Uncertain, Complex and Ambiguous, characteristics which should be used to gauge the degree of influence it can depict on RMN's development focus.

- **RMN Strategic Plan**

Being a vital component to the nation's security, the RMN's Strategic Plan reflects the *“balance between short and long term objectives, between financial*

*and non-financial measure indicators and, between internal and external performance”*. It has to translate the *“organization's mission and strategy into a comprehensive set of performance measures that provides the framework for a strategic measurement and management system”* (RMN Strategic Dept, 2014). Hence, this strategic plan should be the tool for identifying areas for improvement within the RMN in prioritising its decision making process in order to develop the RMN to meet its overall mission, vision and objectives.

- **Border Insecurity and Maritime Cross Border Crimes**

The Lahat Datu incursion was thwarted with the biggest mobilisation of the country's security forces. However, the incident clearly showed that the RMN was inadequately equipped in facing the threat. Post intrusion analysis spelt out that these

intruders used small mobile riverine craft with high speed outboard motors to manoeuvre between the coral infested waters to reach their destination. Evidently, the maritime units on routine patrolling duties were unable to detect or when detected were unable to pursue due to fears of running aground in these confined waters. Nevertheless, this episode literally forced the establishment of the Eastern Sabah Security Command (ESSCOM) which clearly shows the indifferent priority placed on defence wherein an occasion had to arise and cause lives to be lost for the authorities to place extra resources on defence.

#### **TERRITORIAL DISPUTES**

In order for Malaysia to defend its maritime territorial claims, the RMN has to maintain continuous presence around vast disputed waters with existing limited naval assets. Furthermore, to support Malaysia's claims around the Spratly Islands, the RMN will need to exert full maritime deterrence. At present with a vast area to cover, ageing assets and numerous operations, the RMN's credibility to be able to be a real deterrent to the likes of China is questionable. Though the submarines are a sub-surface force multiplier, the RMN require additional significant offensive surface capabilities to deter any imminent threat. Fittingly, the islands also have to be equipped significantly to be able to defend themselves effectively.

#### **ANTI-PIRACY**

Ongoing anti-piracy operations require the RMN's commitment, to deploy naval assets for

continuous joint patrols. However, as the narrow straits imply, the need for fast and mobile crafts with excess speeds of 40 knots is paramount in order to be able to deter or apprehend these pirates from performing their thriving activities.

#### **DEFENCE SPENDING**

Defence spending seeks to ensure that the nation maximises its level of defence budget from the portion of the GDP set aside for that purpose. Unfortunately, Malaysia perceived to be in a benign environment and in the comfort of economic growth, stresses the budget emphasis on the socio-economic sector. However, the existing border disputes and failed incursions should remind the government that the need to build up the RMN's capability to be ready to fight and address conventional and non-conventional threats is equally as important to socio-economic reforms.

#### **DEFENCE INDUSTRY**

Economic development, budget constraints and strategic concerns undoubtedly influence defence demands and industrial growth. Having more offset participation through procurements is the only way defence industries can grow via transfer of technology, training and joint ventures in Research and Development. The collaboration between MAF and defence industries for future RMN capabilities will also have to think conceptually tri-service inter-operability when planning for defence procurement. The aim should be to achieve a procurement decision which is

best value for the nation rather than for defence alone.

#### **CONFIDENCE BUILDING MEASURES**

The ongoing Five Power Defence Agreement (FPDA), bilateral exercise with US (CARAT series) and other ASEAN members serve as good platforms to enhance the fleet's performance and enhance CBM. In order for the RMN to participate actively, its capabilities should be at par and able to inter-operate effectively with the other nations' fleets.

#### **MILITARY MODERNISATION**

The modernisation of the MAF is influenced by all the arguments stated above and has "*evolved through time, pattern of threats, technology development and changing nature of warfare*" (Faudzi, 2014). At present the 4D MAF which forms the basis for the MAF force development capability is at the 4<sup>th</sup> dimension that envisions the MAF "*to transform into a fully integrated and balanced force in all dimensions and giving emphasis on jointness and inter-operability among the 3 services*" (Faudzi, 2014). For the RMN, besides this plan it has its own Strategic Plan, PS1320 and '15 to 5' program. The RMN has cascaded and aligned this strategic plan with the 4D MAF plan as well as cascaded and aligned its processes within the RMN itself. Based on the 4D MAF plan which will cover the current period until 2020, the RMN is planning its development mainly focused on three main agendas which are; joint force operations and integration, superiority of information; and multi-dimensional functions in



the air, land and sea environs with the involvement of Network Centric Operations (NCO).

### '15 TO 5' TRANSFORMATION PROGRAMME

Fiscal challenges, geopolitics and geostrategic issues which has called for RMN to roll out a new transformation and modernization plan called '15 to 5' will catalyse the RMN into a formidable fleet in South East Asia and make it a renowned World Class Navy. The phasing out of the older vessels in the fleet, streamlining and creative optimisation of Operational and Development Expenditure through savings in maintenance and operations costs will not only transform the fleet but also have an impact on the Navy People as a whole which will include a transformation in human resources, infrastructure, housing, welfare, training and maintenance. Accordingly, this transformation is going to bring about change which will be the norm for the foreseeable future where the pace of change will be a continuing and an increasing process. The '15 to 5' transformation change is going to be significant and perhaps radical. Furthermore, with uncertainty being the order of the day, good implementation and management of change is essential and should smooth the path towards a continuing, if different, success. Presently, all sorts of factors contribute to the current nature of the RMN and how it operates. Hence, the transformation process must be well handled to ensure that matters go smoothly and successfully.

*“to transform into a fully integrated and balanced force in all dimensions and giving emphasis on jointness and inter-operability among the 3 services”*

### CONCLUSION

The RMN's ultimate goal is to ensure Malaysia's economic prosperity and political stability. However, issues of conflicts and potential flashpoints envisage its strategic environment and further extend its development focus. The RMN should aspire to not only balance the budget but also to seek a credible and balanced fleet. Its capabilities should be able to respond to conventional or unconventional threats with ease. Our present peaceful existence should not be taken for granted but used explicitly to strengthen the RMN's ability to defend the country should the geopolitical landscape shift. This strategic environment therefore should dictate the preferences for the RMN to plan its future capabilities.

Lastly, should the government still persist to neglect future military capabilities, the RMN's mission accomplishment and force preservation to effectively maintain preparedness will severely affect the future security and sovereignty of Malaysia.

### About The Author



Captain Ivan Mario Andrew RMN N402304 was commissioned into the Royal Malaysian Navy in Jan 88. He has served in several warfare appointments on board several ships which include KD LEKIU, KD SERANG, KD GANAS, KD MUSYTARI, KD MAHAWANGSA and KD KELEWANG. He has also commanded KD SRI SARAWAK and KD LAKSAMANA TAN PUSMAH and presently he is Commanding KD MAHAWANGSA.

Besides his command and ship experiences, he has also been appointed as Senior Navy Directing Staff at Malaysian Armed Forces Staff College (MAFSC), Chief Staff Officer Workup and Inspection Fleet Operations Command and many more. He holds a Master's Degree in Engineering Business Management from University of Warwick (MEBM) and Bachelor's Degree in Business Administration (Management Information System) (BBA) from University Tun Abdul Razak (UNITAR).

# Role Of RMN TRAINING FLOTILLA

Cdr Ahmad Nazim bin Salimin RMN



The Training Ship Squadron Commissioning Ceremony was officiated by the Honorable Admiral Tan Sri Ahmad Kamarulzaman bin Hj Ahmad Badaruddin, Chief of the Royal Malaysian Navy on 26 April 2018 in conjunction with the 84th Navy Day celebrations. There are two ships in the 27th Training Vessel Squadron, KD TEGUH SAMUDERA (Pennant No. 272) and KD GAGAH SAMUDERA (Pennant No. 271).

The establishment of the 27th Training Vessel Squadron recognises and is in continuation of the important date of the establishment of the RMN on 27 April in 1934. The ships were specially constructed to be practical training platforms for RMN personnel and RMN

reserves. The construction of the vessels was the result of a local company's collaboration of NGV Tech Sdn Bhd and Daewoo Company (DSME) from South Korea and they replaced the old and by now obsolete RMN training vessel, KD HANG TUAH. However during the construction of the vessels, there were contractual issues causing the project to be suspended. Following this, Grade One Marine Shipyard Sdn Bhd (GOMS) Company was appointed to complete the construction of the vessels.

Both of the ships were constructed with a length of 75.9 meters and width of 11 meters. Both vessels displace 1364 metric tons and have a maximum speed of 20 knots. They are equipped with a

helicopter landing facility and have a range of 2500 nautical miles. The ships have a complement of 45 and are able to accommodate 60 trainees at one time. Both ships are also equipped with a close combat system, as well as sophisticated navigational and communications systems. All of this will enable the squadron to train RMN personnel for early preparation towards Transformation 15 to 5.

With the presence of the 27th Training Vessel Squadron, the RMN can once again operate platforms to meet the training needs of the people of the RMN's personnel. Among those receiving on board training are Cadet Officers, Voluntary Reserve Team members (PSSTLDM),





recruits, naval personnel course and others.

Various exercises can be conducted at sea on board these training vessels. Among them are navigation training, comms training, evolutions training, shooting training using cannons or small arms weapons, damage control and firefighting training and miscellaneous other exercises. These exercises are mandatory exercises on all RMN ships. Therefore, the various exercises carried out on the training vessel will give the trainees direct hands on experience in preparation for their future roles at sea. In addition, the ship's crews are selected and committed to train the trainees..

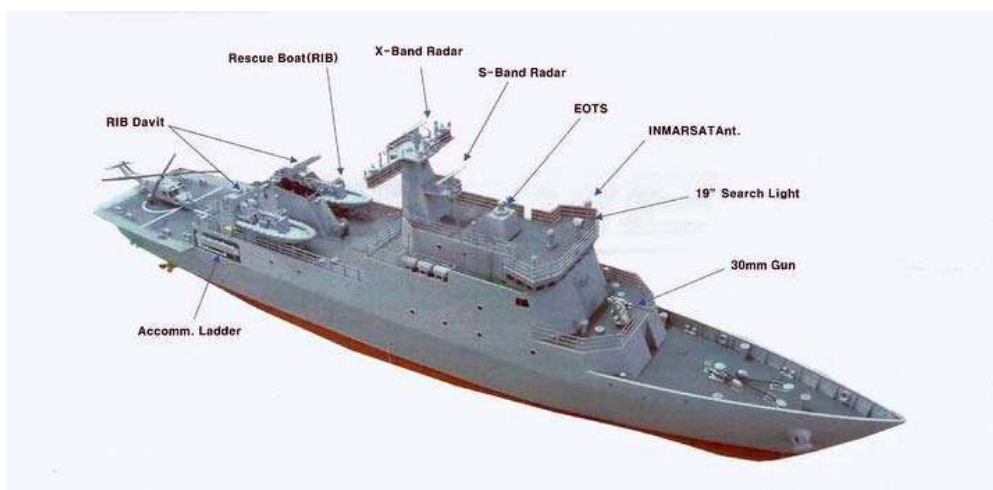
The facilities provided in these vessels are comprehensive for the embarked trainees. Among the facilities provided are 60 bunks including 12 bunks for female instructors and 8 for male instructors. The training vessels provide space for bathrooms and cabins for both genders. In addition, a large and comfortable dining hall is provided for crew and trainees to relax and watch television while having their meals or recreation time. Laundry and linen rooms are also available on board to facilitate washing, drying and ironing uniforms and in addition, a prayer room is available on board. Training

facilities are also provided for marine navigation as well as a training bridge. There is a Medical Treatment Room on board and the ships are capable of treating light injuries. In the event of a serious injury, the patient will be sent to the nearest hospital using helicopter or rescue boat.

The helicopter deck is located aft in each ship. In

required to operate these weapons are regularly practiced by the crew and trainees.

In addition, the vessels are equipped with a variety of communication tools to facilitate the administration of ships in terms of communication with merchant ships and other RMN ships. The radar for short and long range contacts is provided for tracking ships that are not supposed to enter the Malaysian borders. There are two types of radar used by these vessels, S-



addition, the training vessels provide 2 rescue boats to be used if there is an emergency that cannot be avoided.

As training vessels, KD TEGUH SAMUDERA and KD GAGAH SAMUDERA are capable of playing an operational role when required, including the use of rescue boats to be judiciously employed in investigating suspicious vessels in Malaysian waters.

Both ships are warships as well as training vessels and are equipped with a variety of sophisticated weapons including M4s, Glock 17, vector gun, GPMG and 30mm gun. The exercises and skills

band and X-band.

As a conclusion, the KD TEGUH SAMUDERA and KD GAGAH SAMUDERA carry equipment to combat enemy threats such as small weapons, cannons, and rescue boats. In addition to weapons, the crew is also provided with every modern convenience to enable them to perform well.



**Side view**



**Upper view**

**About The Author**



Commander Ahmad Nazim bin Salimin RMN joined the Royal Malaysian Navy on 28 Sep 1995. He has served on various ashore as well as sea going appointments such as KD HANG TUAH, KD LAKSAMANA TAN PUSMAH, KD SRI NEGERI SEMBILAN, Naval HQ, KD PAHANG, HQ Naval Region 2 and Joint HQ. He was the Commanding Officer of KD TEGUH SAMUDERA.



# Open Ship:

# HARI TUDUNG 24 The Guidelines

TRANSFORMASI PEMACU KECEMERLANGAN



Cdr Mohamad Sham bin Saimon RMN

The chief objective of the Naval Ship Open Day is giving the public an opportunity to view the Royal Malaysian Navy assets more closely – up-close and personal. At the same time, it is an ideal occasion for the RMN to give public exposure of the tasks and roles of the RMN in the defence of Malaysia. As the naval community, every member of the navy is also an ambassador who is accountable, although indirectly, to the taxpayers. We are proud to exhibit our ships and our crew readiness in handling any threats or enemies.

Ships are generally ready and make the best preparations to receive visitors from the public. As an organizer for an open ship program, mental and physical readiness is exercised in order to handle a smooth and interactive event. First and foremost, proper planning is carried out by the ship's officers and crew. The



planning includes safety briefing to the ship's crew in handling visitors. Once the visitors are on board, safety briefings are no longer practical due to large crowds. Nevertheless, safety is continuously monitored and ongoing information on safety is broadcast throughout the event.

Advertisements of the program, schedules of events and safety information are best uploaded to social media to inform the public of the necessary preparations

before their visit. Popular mediums such as Facebook and Instagram are the best links to connect us with the public. Additional efforts by live interview or broadcasts on radio and television are good to have prior to any open ship events. Gimmick and news from previous events can also be used as an attraction to encourage more visitors.

There are some important things that the visitors need to be informed of before they visit the ship. Firstly, the accurate date of the event, the venue and the visiting hours. The full use of social media as its medium is not only economical, but also the simplest, fastest and reaches the largest audience. In fact, it is only a matter of creating an event on the social media Calendar, which can later be shared by the public.

Transportation, secondly, is important to visitors. When there is no direct access for visitors to reach the navy ships on display, visitors can drive their way to the location and park at any designated areas that are clearly marked. At certain ports where the ships are situated away from the parking zones, transportation is usually provided by the navy.

Thirdly, clothing or the dress code. Visitors are advised to wear comfortable clothing. Those who wear inappropriate or suggestive clothing are not allowed on board. Bags or handbags are inspected prior to entering the ship due to safety precautions. Since a navy ship has an industrial environment, guests are encouraged to avoid wearing high-heels; jewellery that can get snagged on fittings and carrying bags that are too heavy to carry up and down ladders comfortably.

There is no age restriction to tours on board RMN ships. However, there may be steep ladders to climb and uneven surfaces to traverse during the ship tour. Therefore, tours may require appropriate care for small children, elderly individuals or people with heart conditions, breathing difficulties, or other medical conditions impacting their ability to navigate such

challenges. Toddlers' carriages and wheelchairs are not allowed on board ships due to the confined spaces and passageways.

Photography is permitted on board ships during tours. All photography activities, however, are observed and under supervision of the ship's crew. Visitors may share their decent and appropriate pictures in the social media. There are certain 'sensitive' areas where photo-taking is strictly not allowed and visitors will not normally be allowed to enter.

Prohibited items: there are a number of items that visitors are not permitted to bring on board. Bottles, cans or containers of any type; banners, posters or signs of any type; mace, pepper spray, or other defensive sprays or chemicals; knives, firearms, fireworks or any explosives; illegal drugs; flammable liquids or aerosol spray cans; weapons and animals. The RMN reserves the right to prohibit other items not listed above.

A proper merchandise booth or stall is placed within the ship for visitors. Many visitors are eager to buy some ship's souvenirs as their

memorabilia to bring home. Merchandise item with price tags clearly displayed are sold at the booth, and visitors are served by selected crew members who handle the sale.

Last but not least, the Commanding Officer will ensure a good setup before the program starts. Ship's crew wear the finest uniforms to show the navy's best image. A ship's open day is a special occasion that requires the crew to wear the normal white uniform with peak cap or sailor's cap. In some occasions, Digital Camouflage uniform is used to display our operational image.





## About The Author



Cdr Mohamad Sham Bin Saimon RMN joined The Royal Malaysian Navy on 8<sup>th</sup> July 1993. He graduated from Brunei Staff College. He has served on various ashore as well as sea going appointment and currently appointed as commanding officer of KD SRI INDERA SAKTI. He also qualified as Helicopter Instructor.



# SUN TZU

## Chinese Military General, Strategist and Philosopher

Cdr Mohammed Noorsyarizal bin Mohammed Noordin RMN

### INTRODUCTION

Having the right leader at the right place and at the right time has always been a critical factor to victory. Yet in all military organisations it is not the leader who brings success but their leadership. Leadership in a military atmosphere is that capability of a person to inspire subordinates and peers to fulfil the vision and mission statements laid down in their organizations' goals within their capacity to achieve. Leadership and the military are practically inseparable. What is required is a remarkable person to move from memorizing a creed to actually living that creed; a true leader is such a remarkable person. Possessing good leadership helps to solve and counter challenges and face and overcome them.

### BACKGROUND

Sun Tzu (544 BC) was a Chinese military general, strategist and philosopher who lived in China during the 'Spring and Autumn' period. Most scholars claim that Sun Tzu originated from Wu, a coastal state that controlled the mouth of the Yangtze River during that time. His birth name was Sun Wu and he was also known outside of his family as Changqing. The best name he is known by is an honorific which

means 'Master Sun'. He wrote the most revered and practiced military treatise in the world known as the Art of War.

Sun Tzu is said to have begun his military career as an ordinary soldier in the army of King He Lu of Wu, whose state was among ones frequently at war. Valour combined with exceptional tactics in ambush, espionage and counter-espionage, surprise attacks on enemy camps and use of various unconventional battle strategies at the time, distinguished Sun Tzu from other soldiers.

### ART OF WAR

The 'Art of War' is foremost a guide to military leadership, some of which can easily be applied to management. The 'Art of War' is a masterpiece since it speaks about deploying a fear of death, the element of surprise and various other strategies that would have a negative impact on the enemy morale while boosting the confidence of one's own forces. It contains the qualities vital for a leader and the character of an ideal soldier and their thought processes that culminate into action, especially on the battlefield

### DISCUSSION

#### LEADERSHIP THEORIES AND MODELS

The Great Man Theory was a popular 19th century idea according to which history can be largely explained by the impact of "great men", or heroes: highly influential individuals who, due to their personal charisma, intelligence, or wisdom, utilized their power in a way that had a decisive historical impact.

This type of theory assumes that the capacity for leadership is inherent in which great leaders are born, not made. These theories often portray great leaders as heroic, mythic and destined to rise to leadership when needed. The reason Sun Tzu's leadership is suited to the Great Man Theory is:

- **HISTORICAL LEGACY** is a defining element of Great Man Theory as these individual leaders are historical figures. Sun Tzu was a great figure used in this theory as he made history and led through his influence people to win wars and follow his philosophy even to this day. Due to one man's influence and decisiveness an entire time period was marked forever by this Chinese warrior.



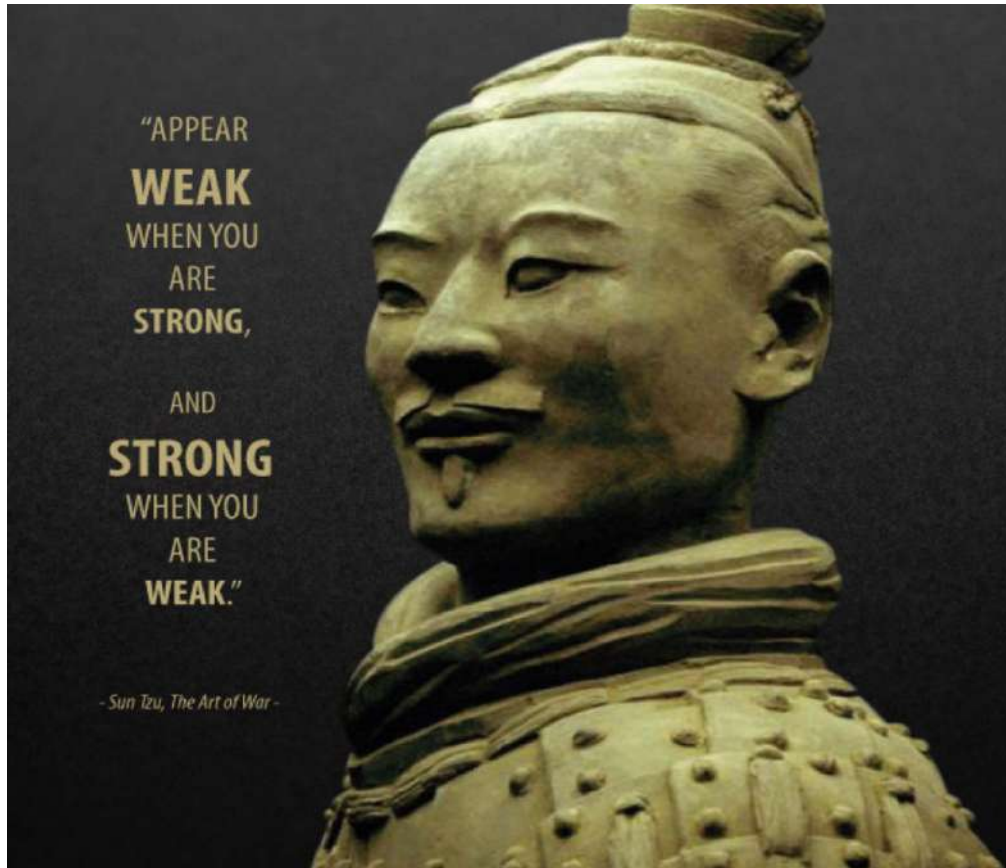
- **ONE MAN CAN CHANGE THE WORLD** he lives in. History describes many great men and women who have left their marks on humanity. For Sun Tzu, he is the great man where his tactics and philosophy are remarkable and is still followed by military officers around the world.

- **LEADERSHIP IS IN LEADER'S HANDS** and leaders have a responsibility to know their platforms and make the best choices possible. In the Battle of Boju, Sun Tzu made the decision to surround the forces of Nang Wa with his smaller forces and yet was able to capture the capital city of Ying to defeat the powerful Chu'u state. This shows that Sun Tzu was able to influence a people and situations. This theory exemplifies that praxis of 'one person can change history' and the fact is a leader change peoples' lives every day.

- **NATURAL LEADERSHIP** Sun Tzu was not trained in leadership nor did he acquire any leadership skills in his lifetime. In other words, there was something in his anatomy, physiology and personality which marked him out from common mortals. His men turned to him instinctively for inspiration, solace and support.

### ANALYSIS

In The Art or War, Sun Tzu characterised leadership as a mix of five traits which can be, intelligence, humaneness, credibility, courage, and discipline. In a modern military environment, these traits are practiced regularly. All the traits can be described as follows:



#### 1. Intelligence

This is the most important trait. If leaders want to succeed, their competence must permeate every aspect of their work. Their technical proficiency must exceed expectations. They must understand the needs and challenges of their enemy or challengers. Leaders must take care in how their intelligence is perceived.

#### 2. Humaneness

Leaders must demonstrate respect for those with whom they interact. This applies to subordinates, personal contacts, and competitors. In an organization, humaneness must be the foremost priority. Humaneness also must be applied toward challengers' organisations.

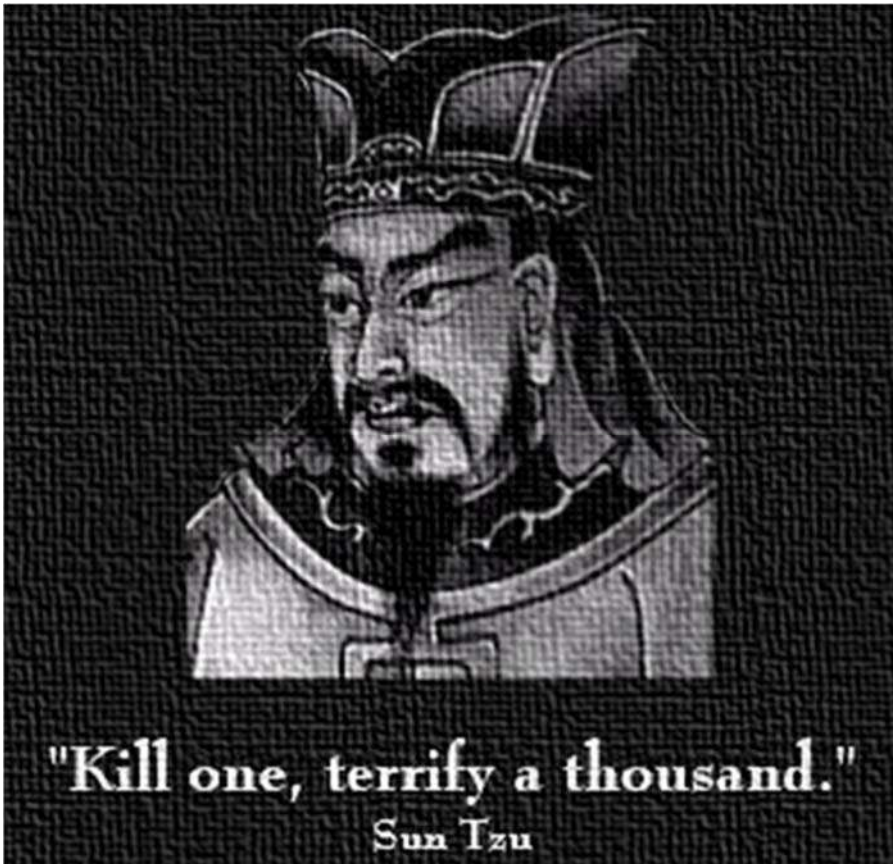
#### 3. Credibility

Credibility emerges from a reputation of trustworthiness and competence. A leader must demonstrate his ability to employ his experience and knowledge to address a challenge relevant to the organisation. Leaders must understand and attend to priorities rather than be distracted. Encouraging subordinates to gain knowledge spares a leader time and energy to focus elsewhere for greater value.

#### 4. Courage

Leaders must project decisiveness and courage in the face of challenges. The credibility of individuals who vacillate under pressure suffers. Consequently, their judgment will be questioned by their subordinates and followers. Courage enables a





leader to recognise the opportunities inherent in all risks.

#### 5. Discipline

In a war, there can be no ambiguity in the chain of command. A leader requires courage to make quick and difficult decisions. It is important to note that often a leader's valour is thought to be crucial in inspiring the entire army and lifting up their spirits. The leader must know the importance of trained and disciplined personnel. Leaders are positioned to evaluate the training needs of their team and enable said training.

#### EFFECT NOWADAYS

Sun Tzu's experiences and superior knowledge about

military strategy were put into his book. This Art of War has been very influential not only across Asia, but also in America and elsewhere around the world. This Famous text can be applied to almost any type of confrontation or competition. These range from business negotiations, legal actions, and sometimes even sports; specifically, football. The Art of War can be everyone's ultimate weapon if used correctly.

#### BUSINESS

The Art of War is widely popular in business because it has similar attributes that war does. Aspects of war and business are very much alike. The leaders of the organization and CEO's will most likely be the ones to really apply the Art of War to their company. Following the guidelines that are given within this book and it

should lead to a prosperous company. A CEO must have a united team or else all will fall. Do not go into a fight blindfolded.

#### LAW

The Art of War isn't so much exposed to a legal system as it is to business, but still plays an essential part in it. A small portion within a legal system is trials. Trials contain alike components that warfare may possess. To win at trial, a lawyer needs to find a weakness in their enemy then exploit it and recognise it as a beneficial opportunity. Know your armory and use it efficiently. Obviously, know what you're talking about. Lawyer must do their research prior to the trial. They must know all types of situations that could reverse them and know how to get manoeuvre around them. The lawyer will be fine as long as he is well prepared. The ones that the art of War applies to are usually the lawyers and their defendants.

#### SPORTS

Sports require a lot of mental thinking. Psychological warfare plays a major role in certain sports behind the physical aspect of all of it. Sports are very similar to warfare in that experience, strength and strategies play a huge role in the outcome. The way an athlete prepares for a game is very similar to how a general prepares his army for battle. The thought process by an athletics manager during a competition is similar to a general planning for his next step. It needs to provide quick and efficient decisions. One wrong move can mean the end of their journey. Even though they all

start from a similar competitive base each sport requires a different strategy to accommodate the needs of that sport. Just as in a battle. The army must prepare and follow the commands from the general. It's a little more complicated in football. It does require preparation and to carry out what they have been practicing into a game. They must study the opposing team before the game and even during the game. The team may have to determine their next move based on what the opposing team decides to do.

## CONCLUSION

Sun Tzu, the Chinese General has shown the value of leadership. It can be said that to achieve tasks

successfully, the organization needs to have strong elements of leadership just like Sun Tzu. He originally wrote a book that laid out the basics of how to win a war. He probably didn't intend for it to be a guideline to become extremely successful in other parts of life besides fighting. This text has become paramount in any triumphant business, law firm, and even sports teams. This paper has achieved the purpose of studying Sun Tzu and leadership qualities. Sun Tzu's principles that have been described above can be practiced by a leader or personnel, especially in military organisations, if they want to succeed on the battlefield. Moreover, by applying these principles will help to improve people in business as well.

### About The Author



Commander Mohammed Noorsyarizal bin Mohammed Noordin RMN was born on 31<sup>st</sup> of March 1980 at Kedah. He enlisted with the Royal Malaysian Navy (RMN) on the 24<sup>th</sup> of Mei 2001. Throughout his career, Commander Noorsyarizal has held various appointments both sea and shore.

He spent most of the time of his early career serving onboard as Operation Officer onboard KD LEKIU. Among the posts were as Anti Air Missile Officer, Gunnery Officer, Anti Air Warfare Officer and Principal Warfare Officer. He also had opportunity to Command as Commanding Officer for Fast Attack Craft (Missile) Class, KD GEMPITA in 2012. His profession started when he joined the Warfare Specialisation Course at Kapal Diraja Sultan Idris I and further enhanced when he attended for International Principal Warfare Officer (A) Course at MWS COLINGWOOD, United Kingdom. Currently, he is the Commanding Officer of KD JEBAT.

# Anti Challenges & Limitations Submarine for Warfare ROYAL MALAYSIAN NAVY

Lt Cdr Sujjetheran a/l Suparmaniam RMN

## INTRODUCTION

The Royal Malaysian Navy (RMN) had ordered two *Scorpene* class submarines constructed by a French shipbuilder, *Direction des Constructions Navales* (DCNS) and its Spanish counterpart, Navantia. The project was started on 5<sup>th</sup> June 2002. The contract also included the training of 150 RMN personnel to become submariners and their training was conducted in Brest, France where they were taught all aspects required in operating a submarine safely by the French Navy (FN). The first vessel, Kapal Diraja TUNKU ABDUL RAHMAN was launched on 24<sup>th</sup> October 2007 at the DCNS Dockyard, Cherbourg, France and she was commissioned in January 2009. The second RMN submarine, Kapal Diraja TUN RAZAK, was commissioned on 5<sup>th</sup> November 2009 at Cartagena, Spain.

## ROLES

Submarines have several roles such as patrol, screening, mining, reconnaissance, Special Forces insertion and extraction. But the most important role is warfare, either anti-surface or anti-submarine, employing its sophisticated detection and

combat system which makes the submarine such a potent threat to a surface warship. This is due to the modern submarine being equipped with multi-purpose weapon systems that can be applied either to counter surface or underwater threats. Stealth technology is incorporated into the submarine's design that makes it harder to be detected by a surface ship's sonar. Submarines can also perform duties such as a rescue unit to rescue our personnel if they are trapped behind enemy lines. In addition, Submarines can replace the duty of aircraft or surface ships as an alternative mean of transportation for military equipment if conditions demand it. Whenever a country acquires submarines, it will become a major ASW problem to other countries within its operational reach. Naturally, submarine operations in a crisis may be employed to directly pressure another country. It is

essential then that a strategic asset requires competent crews to operate it to maximise its threat potential.

## CHALLENGES AND LIMITATIONS

For the RMN several problems have been identified affecting submarine operations such as the number of submarines in the RMN fleet compared to the size of the area of operations (AO). To preserve Malaysian underwater sovereignty, the RMN's submarines cannot fulfill this requirement with only two vessels. This is because the South China Sea alone is just too large to be covered by two submarines. The South China Sea area is approximately 310,000 km<sup>2</sup> and mostly exposes the east coast of Peninsular Malaysia, Sabah and Sarawak. In order to fulfill the role of protecting underwater sovereignty, submarines must be strategically stationed in the AO.





Besides that, RMN surface assets are seldom interact with the submarines. This is a critical problem in terms of Anti-Submarine Warfare (ASW) exposure as the surface assets could not exercise or provide the most effective tactics to counter submarines in our own environment. The interaction between both assets ought to be planned and executed accordingly so that maximum use of tactics, assets, and knowledge can be attained. The interaction period can be done so that the training value can be of maximum benefit to both types of assets. Interaction intervals should be regular and consistent in order to enhance the training value.

The RMN is also facing human resource constraints as well. For instance, most of the personnel are unable to meet the requirements of submarine operations. With these problems lingering in the RMN submarine society, the submarines will be operated by fatigued operators. Therefore, human resources limitations need to be taken into consideration in submarine operations.

As most RMN personnel knew, the risks of collision at sea always exist and this also applied to the submarine. The submarine is exposed to navigation hazards such as geographical features and collisions with other vessels more than a surface warship. Even though Scorpenes are equipped with leading edge technology, still, the danger of a collision cannot be cancelled out when underway.

The employment of a Deep Submarine Rescue Vehicle (DSRV) is another major problem

encountered by the RMN, despite the fact that HQ SF has established the Submarine Escape and Rescue (SMER) team. The current SMER capabilities are still relevant as SMER operations have been classified as unrestricted. In terms of time, the *Scorpena* manufacturer claims that a Scorpena is capable of surviving underwater for maximum 7 days depending upon damage. As for international support of SMER, it takes about 2 days before the rescue operation at sea can begin and it is predicted theoretically that survival rates are 70%; this proves that RMN SMER capabilities can support submarine operations.

#### RECOMMENDATIONS

In order for submarine to accomplish its role; there are a few recommendations suggested regarding operations, human resource and maintenance. For operations, it is recommended that the submarine operational command needs to identify the areas which have a high probability where conflict will likely occur. Hence, pre-planned actions can be taken within the identified areas and provisions made considering the nature of the area and the advantages to be gained from geological factors in it.

The other method to solve this problem is to increase the number of submarines in the RMN. If this can be achieved, the AO would be adequately covered. By increasing the number of submarines, the range of deployment for submarines will be further out to the South China Sea. The possibility for submarines to counter foreign threats in

Malaysia's territorial waters, exclusive economic zone and area of interest would certainly be increased. As a result, Malaysian underwater sovereignty will be preserved.

Joint exercises between the surface assets and submarines within the area of operations should be increased. The gained training values will be an asset when called upon to respond to the nature and possible actions taken by the surface or sub-surface assets of a potential enemy. As a result of such training the RMN, above and below the surface, will be more familiar with possible enemy actions and the result of countering threats within our territories will be faster as well as more effective.

Secondly, within the RMN culture the submariner's environment is not popular. This creates an issue as the naval personnel of the RMN cannot meet the operational requirements of the submarine force. This was proven during the recruiting of new submariners: the total number applied to man the submarines was around 270 applications and for the second batch only around 50 applications were received. In order to overcome this problem, it would be best for the management to give a few advantages towards submariners so that the morale and mental state of candidate for submarine service will be able to meet the submarine force's personnel demands. The RMN should look into suggestions such as increasing allowances based on qualifications. In addition, the RMN should automatically convert their commission to permanent service once they qualify as a submariner. With

these offers toward submariners, there should be more RMN personnel interested in joining the submarine service.

After the submarine human resources have successfully resolved the recruiting problem, the RMN should establish three sets of crews similar to what has been done by the French Navy. The first crew will focus on the current operation. The second crew will be on standby for the first crew, including training while the third crew will be doing the administration. The purpose of having three sets of crews is to maintain the morale of the crew, prevent the crew from having fatigue and increase submarine availability. Other than that, submarine crews have to maintain their oral tests and other training when they are at their base so that their submarine allowance can be maintained.

Lastly, Malaysian submarine exercise area (MSEA) should be employed regularly. Three MSEAs were established within Malaysian EEZ and announced in the Malaysian Notice to Mariners edition 04 of 30 April 2017 It is for consideration that the RMN should also increase the number of MSEA.

## CONCLUSION

As a conclusion of this analysis, we can conclude that the Scorpene Class is very capable to be operating in the South China Sea and this class of submarine provides lots of advantages. The RMN made the right decision of purchasing two submarines to protect Malaysia.

# DIVING INTO SUBMARINES

### KD Turku Abdul Rahman (scorpene) Periana Menteri class (diesel-electric)

*Named after the first Prime Minister in recognition of his contribution in leading the country to independence.*

<b>Fire power</b>	6 factories of torpedoes Sub-surface to surface missiles Anti-ship surface missiles Anti-submarine torpedoes	<b>Mission</b>	Clearly to protect Malaysian waters. Build a naval network with neighbouring countries. Better anticipate the impacts of changing maritime traffic.
-------------------	---	----------------	---

**Crew** 32 members only (highly automated)

**Length** 62.5m  
**Submerged displacement** 1,550 tonnes

### USS Houston (SSN-733) nuclear-powered submarine

*Designed exclusively for carrier battle group escort. It can launch MK48 and AGCP torpedoes, Harpoon anti-ship missiles, and both land attack and anti-airship Tomahawk cruise missiles.*

**Length** 109.7m  
**Submerged displacement** 7,011 tonnes

#### Range of subs

<b>Russian Akula (Typhoon class) SSBN (largest in the world)</b>	Length: 170-172m Surface displacement: 23,200-24,500 tonnes Submerged displacement: 38,400-44,000 tonnes
<b>United States (Ohio class) SSBN/SSGN</b>	Length: 175m Surface displacement: 16,748 tonnes Submerged displacement: 18,750 tonnes
<b>Soviet/Russia (Anetey, Oscar-II class) SSBN</b>	Length: 150m Surface displacement: 12,540-14,700 tonnes Submerged displacement: 15,500-16,400 tonnes
<b>Soviet/Russia (Shchuka, Victor III class) SSN</b>	Length: 80-102m Surface displacement: 6,990 tonnes Submerged displacement: 7,250 tonnes
<b>Malaysia (French designed Scorpene class, renamed Periana Menteri class) SSK</b>	Length: 67.5m Surface displacement: 1,145 tonnes Submerged displacement: 1,550 tonnes
<b>Germany (U212 Sauro class) SSG</b>	Length: 50m Surface displacement: 1,204 tonnes Submerged displacement: 1,810 tonnes

**Notes:**  
 SSBN multi-missile submarine nuclear-powered  
 SSN attack submarine nuclear-powered  
 SSGN SSN with dedicated non-ballistic cruise launchers  
 SS diesel submarine  
 SSK patrol submarine with AGW  
 SSGN SSN with the nuclear capability  
 SS diesel submarine coastal  
 SS diesel submarine attack

#### Countries with submarines

There are at present 41 countries that have operational submarines. Only three countries have fleets that are exclusively nuclear-powered: the United States, Britain and France. India has launched her first locally-built nuclear submarine.

<b>USA</b> - 33 submarines (24 SSBN, 4 SSGN and 5 SSN)	<b>Britain</b> - 13 (6 SSBN, 5 SSN)
<b>China</b> - 34 (estimated) (2 SSBN and remaining various categories)	<b>France</b> - 10 (6 SSBN, 4 SSN)
<b>Russia</b> - 46 (12 SSBN, 9 SSGN, 16 SSN and 13 SSK)	

Malaysia has just joined the ranks of nations with submarines. The others are Algeria, Argentina, Australia, Brazil, Bulgaria, Canada, Chile, Colombia, Costa Rica, Ecuador, Egypt, Germany, Greece, India, Indonesia, Iran, Italy, Israel, Japan, the Netherlands, North Korea, Norway, Pakistan, Peru, Poland, Portugal, Singapore, South Africa, South Korea, Spain, Sweden, Taiwan, Turkey, Ukraine and Venezuela.

## About The Author



Lieutenant Commander Sujiestheran a/I Suparmaniam RMN N/403950 joined the Royal Malaysian Navy in 29 May 2002 and present appointment as Comanding Officer of KD LAKSAMANA MUHAMMAD AMIN.

He has served with Royal Malaysian Navy with various appointment on board ships and bases. He graduated Diploma in Technology Management from Universiti of Technology, Malaysia and Bachelor Degree in Business Administration from University Tun Abdul Razak. He has attended Mine Warfare Orientation International and International Mine Counter Measure Officer at MWTC Ingleside Texas, United States of America on 2008.





# The Importance of Mine Warfare In Royal Malaysian Navy

Lt Cdr Lim Kim Tat RMN

## INTRODUCTION

The naval mine is an efficient force multiplier and is one of the most cost effective weapons in the naval arsenal.

The advantage of laying sea mines, even a limited minefield in port approaches, in focal areas, or in choke points is that it can deny an enemy free access. A known or suspected minefield will cause an adversary to either accept the loss of access and associated costs or commit resources to lengthy and costly mine countermeasures (MCM) operations. By engaging an adversary with a covert weapon it maintains a continuous threat and presents them with a significant psychological threat and cost - forcing an adversary to operate both military and commercial shipping in areas that make them more vulnerable to other weapons.

## AIM

To state the importance of Mine Warfare in the RMN.

## DISCUSSION

### GEOGRAPHY

According to the International Maritime Organization (IMO), an understanding of Maritime Domain Awareness involves elements that relate to the safety, economic and maritime environment of an area or waters owned by a country including maritime activities such as trade through shipping and existing infrastructure services.

Malaysia is a maritime country with a coastline of 4800 km, the Malacca Strait located in west of Peninsular Malaysia is one of the busiest routes in the world with an average depth of 53 m and an area of about 603,210 sq km. The Malacca Strait forms a vital sea line of communication between the Indian Ocean and the Pacific Ocean and links three countries with the world's largest populations, India, Indonesia and China. The Malawali Strait, located in East Malaysia, is a gateway connecting the South China Sea and the Pacific Ocean.

In addition to the above, Malaysia also has a total of 18 public ports and 7 of them are major ports: Port Klang, Johor Port, Port of Tanjung Pelepas, Kuantan Port,

Penang Port, Bintulu Port and Kemaman Port. These ports are believed to contribute directly to the rapid economic growth of the country. Almost all our ports are not directly connected to the seafront. The exits and entrances to the main ports of the country are categorized as shallow waters which is an ideal situation for minefields for the country's maritime defence but also has the potential to be mined by an adversary.



## MINES THREAT

The use of mines as a weapon in the history of the world has proven it's effectiveness compared to other sophisticated weapons according to the table below:

Serial (a)	War (b)	Missile (c)	Torpedo (d)	Air Attack (e)	Mines (f)
1.	1991 <i>Desert Storm</i>				USS PRINCETON (CG - 59) USS TRIPOLI (LPH - 10)
2.	1897/88 <i>Tankers War</i>	USS STARK (FFG - 31)			USS SB ROBERTS (FFG - 58)
3.	1972 <i>Vietnam War</i>			USS HIGBEE (DD - 806)	USS WARRINGTON (DD - 843)
4.	1967 <i>Israel War</i>		USS LIBERTY (AGTR - 5)	USS LIBERTY (AGTR - 5)	
5.	1950/52 <i>Korean War</i>				USS BARTON (DD - 772) USS E.G. SMALL (DDR - 838) USS WALKE (DD - 723) USS MANSFIELD (DD - 728) USS BRUSH (DD - 745) USS SARSI (ATF - 111) USS PARTRIDGE (AMS - 31) USS PLEDGE (AM - 277) USS PIRATE (AM - 275) USS MAGPIE (AMS - 25)

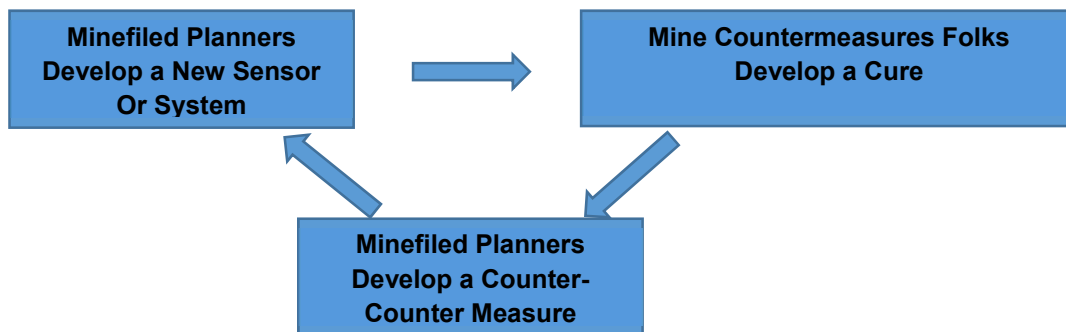
Table 1: United States ship casualties, 1950 to present.

The Strait of Malacca is one of the busiest international routes in the world, it is vulnerable to any threat intended to paralyze the economy of Malaysia, its neighbours or to a significant degree the regional and even the global economy. Additionally, the Malacca Strait is classified as disputed waters by some countries, Malaysia and Indonesia in particular. If the entrances to the Malacca Strait were sown with enemy mines, it would have a very negative impact and could immediately bring down the economic stability of Malaysia as four of the seven major Malaysian ports are within the Strait of Malacca. There would be no further shipping

activity for trading purposes but these ports would also encounter problems after an embargo is enforced further affecting the security and sovereignty of the country.

### CONCLUSION

The evolution of Mine Warfare can be described as the concept of "Tail Chase". In parallel with mine development, MCM system developers will focus on the ability to address the mining threat. This continuous cycle as follows:



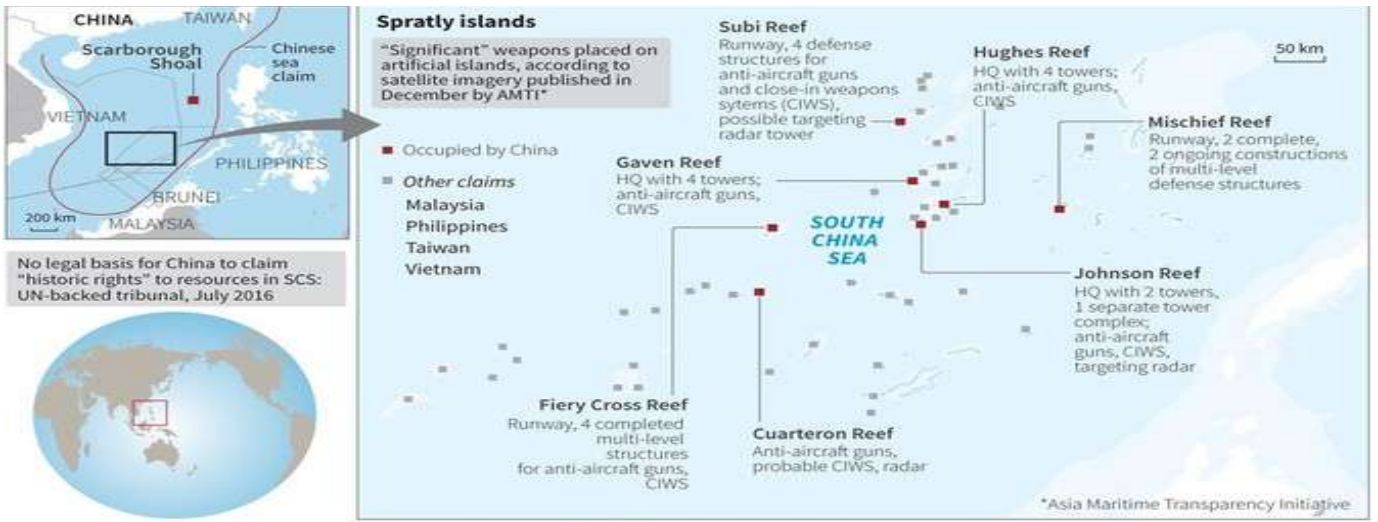
The navy budget for Mine Warfare in general is small and negligible compared with the budget for other forms of maritime warfare. Yet there has been no major upgrading of Mine Warfare assets, systems and supporting systems in the RMN for the past 10 years. However, in line with the 15 to 5 transformation programme in the RMN, it is forecast Mine Warfare aspects will not be neglected in order to face today's complex maritime warfare environment. It should be stressed that Mine Warfare is principally for the use of weaker naval forces to defend against, and prevent being overcome by stronger ones.

#### About The Author



Lieutenant Commander Lim Kim Tat RMN N/404235 joined the Royal Malaysian Navy in 26 May 2003. (CADET INTAKE 53). His present appointment is the Commanding Officer of KD MAHAMIRU. He has served in various units, including being appointed twice as the Operation Officer and Executive Officer onboard KD MAHAMIRU. He attended Mine Warfare Officer Course in 2010 and has academic qualification as a holder of Diploma in Technology Maritime.





No legal basis for China to claim “historic rights” to resources in SCS: UN-backed tribunal, July 2016



Sources: PCA/CSIS/AMTI/D.Rosenberg/MiddleburyCollege/HarvardAsiaQuarterly/Phil gov't/ChinaMaritimeSafetyAdministration



**Sources:**

<https://www.japantimes.co.jp>

<https://amti.csis.org>

<https://www.financialexpress.com>

<http://www.arabnews.com>





# PUSTAKMAR 2018



Navy

PUSAT TAKTIK MARITIM





STRATEGY WITHOUT TACTICS IS THE  
SLOWEST ROUTE TO VICTORY.  
TACTICS WITHOUT STRATEGY IS THE  
NOISE BEFORE DEFEAT.



CAKAP TAKTIK MARITIM



**STRIVE** **FOR** **VICTORY**