

INDIAN NAVY IN THE YEAR - 2014

Perspective Planning and Ship Production

Significant initiatives to shape the future Indian Navy fructified in the realm of Policy and Plans. The Navy saw the publication of three major documents i.e Maritime Capabilities Perspective Plans 2012-27, the XII Plan Document and the XII Infrastructure Plan Document, which was revised to include additional schemes.

The Indian Navy continued to train and evolve to meet the emerging challenges to our maritime interests. The Navy's focus was to evolve a force structure commensurate with the geopolitical and economic aspirations of the nation, within the scope of funding and indigenous ship building capacity. Threats, missions and affordability, therefore, remained dominant factors in force structure planning. The modernisation and enhancement of the Navy's capabilities to meet emerging maritime challenges/ threats continued to be an ongoing process. These included aircraft carriers, stealth frigates, destroyers, corvettes, amphibious ships, offshore patrol vessels and submarines. The Indian Navy also inducted state-of-the-art aircraft and helicopters to augment our surveillance and integral aviation capabilities.

Ship Induction. The following ships were inducted into the Navy:-

- (a) INS *Vikramaditya*.
- (b) INS *Kolkata*.
- (c) INS *Kamorta*.
- (d) INS *Sumedha and Sumitra*.

Naval Infrastructure

The Indian Navy was allotted 5.41 acres of land in Delhi, for construction of the Nau Sena Bhawan or the Naval Headquarters building. The foundation stone for construction of the building was laid by the Hon'ble

Raksha Mantri on 20 Aug 14. Nausena Bhawan II is planned to be built opposite Naval Officer's Mess, Varuna on the land already acquired for the purpose.

In order to address accommodation for married naval personnel, a special Married Accommodation Project was set up to monitor and execute all housing projects of the Army, Navy and Air Force. The Govt. of India had in August 2002 approved the construction of 6,332 houses under MAP for the Navy in two phases at 16 naval stations. Of these 2,687 houses constructed under Phase I, were completed and 3,967 houses under MAP II, were at various phases of completion. The construction of additional houses at various Naval stations has been additionally taken up by the Indian Navy under Phase III of the Married Accommodation Project.

The Karwar Naval Base is fully operational and caters to berthing, operations and maintenance facilities for ships and support craft. The facilities include a breakwater, a pier for berthing ships and associated services, ship-lift, dry berth and repair facilities, logistics facilities, accommodation for personnel, schools, sports and recreational facilities and a 141 bed hospital with all modern facilities. The Headquarters Karnataka Naval Area and Naval Officer-in-Charge (Karnataka) organisation and depot Ship INS *Kadamba* comprise Project Seabird. Additional funds were sanctioned by the Government of India in December 2012 for augmentation of infrastructure and other facilities as part of Phase II. The augmentation would cater for berthing of additional ships, submarines and yard craft. All necessary clearances from environment point of view were obtained from the Ministry of Environment and Forests.

The training of Indian Navy and Indian Coast Guard cadets commenced at the Indian Naval Academy, Ezhimala from July 2009 onwards. The initial capacity of 600 cadets was augmented to 750 cadets in end 2011 and subsequently enhanced to 1050 cadets. Further, expansion of Indian Naval Academy to accommodate 1200 cadets is also being progressed.

Financial Planning

The Navy has always maintained a healthy Capital to Revenue ratio in accordance with the Ministry of Finance guidelines. The Naval budget is utilised for operational commitments, such as coastal security, anti-

piracy patrols and other important operational commitments, for maintenance of the naval assets to ensure Minimum Force levels and ensure continued operational availability of platforms, towards habitability and welfare of personnel etc.

Naval Hydrography

Over the years hydrography has emerged as an effective diplomatic tool for furtherance of India's national interests. Hydrographic cooperation has been at the forefront of the Indian Navy's engagements with countries of the Indian Ocean Region. The multirole capabilities of our ships have been amply demonstrated during the successful conduct of pioneering hydrographic surveys that have been undertaken in the past few years. During the last three years the Indian Navy has undertaken foreign cooperation surveys for countries in the IOR such as Mauritius, Seychelles, Maldives, Sri Lanka, Kenya, Tanzania and Mozambique. The Indian Naval Hydrographic Department has been actively involved in hydrographic co-operation with several countries in the Indian Ocean Region.

The National Institute of Hydrography, Goa conducted hydrographic training for Indian Naval and civilian personnel from India as well as overseas. The institute has been classified by the International Hydrographic Organisation as the premier regional training centre for hydrography for Africa, Persian Gulf and the South East Asian region. The courses being conducted at the institute have been re-certified as internationally recognised Cat 'A' and Cat 'B' courses by the International Hydrographic Organisation in 2013.

Foreign Cooperation

The Navy continues to be an instrument of the state and reflects the state's aspirations, strengths and value system. Naval diplomacy and Foreign Cooperation play a pivotal role in realising these. In reflection of this reality and in keeping with the changing global order, our international maritime engagement with our maritime neighbours has grown rapidly over the last few years.

Navy-to-Navy cooperation is a military activity that is intended to shape the operational environment during peacetime in order to leverage relationships and goodwill generated when required. The desired end state of our foreign cooperation initiatives, therefore, is to foster a sense

of confidence amongst the maritime forces of the Indian Ocean littorals of the reliability and capability of the Indian Navy as a partner to facilitate and improve the net maritime security in the region while simultaneously, being engaged in professional exchanges with a wide range of Navies across the globe.

The Indian Ocean Region littoral nations look to India as a stabilising factor in the IOR and a dependable partner for maritime security needs. The potential of the Indian Navy as an instrument of the nation's foreign policy is well recognised. The Indian Navy has achieved a robust level of engagement with a large number of Indian Ocean Region littorals, through foreign cooperation initiatives such as Indian Ocean Naval Symposium and MILAN. This engagement includes endeavours towards development of a Humanitarian Assistance and Disaster Relief framework among regional maritime forces, bilateral maritime cooperation, contribution to 'Look East Policy', coordinated patrols and Exclusive Economic Zone surveillance, sharing of White Shipping information, miscellaneous initiatives of Naval diplomacy and Navy-to-Navy Staff talks etc. The strength of the Indian Navy's contribution was illustrated in the success of the six month long voyage of Sail Training Ship INS *Sudarshini*, in 2012 - 13, across nine ASEAN countries, to commemorate 20 years of close India - ASEAN relations.

Indian Ocean Naval Symposium. Driven by the need to address regional vulnerabilities by capitalising upon regional strengths, IONS was launched in February 2008 as 21st century's first significant international maritime-security initiative. There are 35 littoral states (and two observers) in the IOR and they have been grouped into four sub-regions (South Asian, West Asian, East African and South East Asian littorals and Australia). IONS seeks to provide a regional forum through which the Chiefs-of-Navy (or equivalent maritime agency) of all the littoral states of the IOR can periodically meet to constructively engage each other through the creation and promotion of regionally relevant mechanisms, events, and activities. IONS chairmanship is rotated sequentially through each of the four sub-regions. This was to ensure that challenges of each region receive due emphasis. The IONS Chair was held by India from 2008 - 10, UAE from 2010 - 12 and South Africa from 2012 - 14. The current Chair is Australia till 2016 and Bangladesh thereafter.

Naval Operations and Exercises

The following major exercises and events were conducted during 2013-14:-

- (a) **Tropex-14**. The annual theatre level exercise, TROPEX 2014 was conducted during February to March 2014. In addition to the naval assets of all Commands, Indian Air Force and Indian Coast Guard assets also participated in the exercise.
- (b) **DGX**. The annual Defence of Gujarat Exercise 14 was conducted during November to December 2014 in the North Arabian Sea with active participation by the Indian Air Force and Indian Coast Guard.
- (c) **IBSAMAR**. Indian Navy participates in biennial exercise IBSAMAR with the Brazilian Navy and South African Navy. The 2014 edition was conducted in Simon's Town, South Africa from 20 October to 07 November 2014 and Indian Naval Ship *Teg* along with an integral helicopter participated in the exercise.
- (d) **Coordinated Patrol (CORPAT) with Indonesia**. The CORPAT with Indonesian Navy was conducted in September 2014.
- (e) **Indo-Japan Exercise (JIMEX)**. The second India-Japan bilateral exercise, JIMEX was conducted off Chennai from 19-22 Nov 13.
- (f) **Indo-UK Naval Exercise (KONKAN)**. KONKAN 13, the bilateral exercise between Indian Navy and the Royal Navy of Britain was conducted off the West Coast of India in October 2013.
- (g) **Coordinated Patrol (CORPAT) with Myanmar Navy**. The second Indian Navy - Myanmar Navy CORPAT was conducted from 13 to 21 February 2014. The opening ceremony was conducted at Port Blair and closing ceremony at Yangon, Myanmar.
- (h) **Indo-Singapore Exercise (SIMBEX 14)**. The Singapore India Maritime Bilateral Exercise (SIMBEX) 2014 was held in the Andaman Sea in May 2014 with participation by two war ships from each country, along with air assets.

(j) **Indo-Sri Lanka Bilateral Exercise (SLINEX)**. The inaugural Indian Navy – Sri Lanka Navy Bilateral Exercise, SLINEX, was conducted off Sri Lanka in December 2005, September 2011 and October 2013.

(k) **Indo-US Bilateral Exercise (MALABAR)**. The 18th edition of MALABAR was conducted in the Western Pacific from 24 to 30 July 2014.

(l) **RIMPAC**. RIMPAC is the largest multilateral naval exercise in the world which is conducted biennially. INS *Sahyadri* participated in RIMPAC - 14 which was conducted off Hawaii from 01 July - 01 August 2014. This was the first time that an Indian Naval ship took part in RIMPAC.

Anti Piracy Operations

Piracy off the coast of Somalia had grown steadily over the years and had assumed alarming proportions in 2010 and 2011. The number of piratical incidents reported in 2011 was 237. However, there has been a noticeable decline in piracy since 2012 with no piratical incidents being reported east of 65° E long since April 2012.

To protect Indian-flagged ships and Indian citizens employed in sea-faring duties, Indian Navy commenced anti-piracy patrols in the Gulf of Aden from October 2008. During deployments for anti-piracy operations, Indian Naval ships have thwarted 40 piracy attempts on merchant vessels. As a result of pressure being applied by Indian Navy and other Navies in the Gulf of Aden, the incidents of piracy had shifted to new areas in the East Arabian Sea. In order to counter this trend, Indian Navy substantially increased its anti piracy deployment in the East Arabian Sea since November 10. As a result of these extensive and intensive deployments by the Indian Navy, the threat of piracy attacks was greatly reduced in this area and there has been no piracy incident within 450 nm from our West Coast since April 2012. Consequently, Indian Navy has been taking up the case at various international forums to revise the High Risk Area of Piracy, the eastern limit of which presently extends to cover the Indian coastline up to 78° E longitude.

Naval Meteorology & Oceanology

Accurate weather prediction is a challenging task, particularly for the Navy, which plans and executes operations on a wide range of spatial and temporal scales and in all the three domains. More than ever before, units at sea need timely and reliable environmental assessment. Naval meteorological and oceanographic services have come a long way since 1952 in support of ever-increasing complexity of Naval operations. The mission of the Naval METOC team is inherently challenging as it looks after not only the surface environment, but also the air-sea interface and underwater environment. The mandate encompasses provisioning of meteorological and oceanographic information, product and services in support of Maritime Operations in all dimensions.

The Indian Navy has operationalised Indian Naval Meteorological Analysis Centre, at Kochi in September 2013. It has been set up as an independent unit with the mandate for centralised reception of meteorological data/ other inputs, processing of data, value additions in terms of generated products at the Main Hub and dissemination of products to Pan-Navy. With the operationalisation of the facility, Indian Navy has achieved technological advancements as well as compatibility with the systems at India Meteorological Department and the National Weather Agency. Commissioning of the facility has heralded beginning of a new chapter in the field of meteorology in the Indian Navy and a comprehensive venture in data basing and analysis of Met data in support of Naval Operations.

Coastal Security

Strengthening of maritime security including offshore and coastal security is a multi-stakeholder activity, and measures are being implemented by various Ministries/ agencies. These measures broadly include induction of assets, recruitment of additional manpower, development of infrastructure, improving information exchange mechanisms, addressing gaps in existing systems, etc.

Continued efforts towards greater inter agency coordination at all levels have resulted in an increased coordination and cooperation amongst all stakeholders. A National Command, Control, Communication and Information (NC³I) Network interconnecting *IN* and ICG stations has been established to develop a Common Operational Picture between the Indian Navy and the Indian Coast Guard. The network integrates inputs

from the chain of static sensors, stations of the National AIS Chain, LRIT and information from open sources.

Environmental Concerns/ Pollution Control Measures

The Indian Navy proactively identified alternatives for ozone depleting Halon gases used for fire fighting onboard Indian Naval platforms. New construction ships are being fitted with systems using CO₂ and Water Mist. Further, twin fluid water mist system for fire suppression onboard ships is being evaluated for indigenous development. Diesel engine propelled ships of the Indian Navy were obliged to meet Tier-II norms of MARPOL by 01 January 2011. Towards this efforts have been initiated to induct diesel engines and boat engines which are aligned to the emission norms of MARPOL. In order to meet deadlines that had been committed by the Government of India in accordance with the Montreal Protocol, use and production of Chlorofluoro Carbons based refrigerants has been discontinued with effect from 2010.

Indigenisation

The Indian Navy embarked on developing indigenous capability and capacity across the complete spectrum of warship operations, be it in designing ships from first principles; integrating complex equipment and systems across all disciplines (hull, marine, electrical, weapons, sensors and armaments), to make a ship sea worthy and combat worthy; right up to equipment and component level. As all these activities are highly specialised, requiring deep understanding in their respective domains, development of indigenous capability has therefore been judiciously and very thoughtfully distributed across vertically specialised organisations catering to surface ships design, submarine design, weapons system integration, armaments, etc. Further the Navy has been leveraging the capabilities of DRDO in developing appropriate technologies and products that go into making potent platforms, to deliver ordnance where due. In order to ensure that there is no duplication of effort, the Directorate of Indigenisation is presently undertaking development of equipment and systems, other than those belonging to weapons and sensors, aviation and armament.

As a part of active interaction with the industry, the Indian Navy conducted workshops and seminars in coordination with Confederation of Indian Industry. Directorate of Indigenisation has sensitised the industry through training, conferences etc. The Indian Navy also

supported CII for conduct of NAMEXPO-13, the first ever Naval and Maritime Exposition in September 2013 at Kochi Port Trust. During this exposition, a two day seminar on areas of interest to the Navy was scheduled, with eminent speakers from the *IN*, industry and academia. A large number of industries including delegations from abroad participated in NAMEXPO-13.

Human Resource Development

The Indian Navy is at the epicentre of the ongoing modernisation of the Indian Armed Forces. New technologies, and with it the attendant capabilities are being assimilated by the Navy at an unprecedented rate. However, induction of new technology by itself does not translate into operational capability unless it is matched by presence of a well trained and motivated human resource to harness such technology. Accordingly, the Human Capital Strategy Document for the Indian Navy was promulgated in May 2013. The Human Resource Capital Strategy seeks to align induction, training and grooming of Human Resource to the Navy's overall plan of development. The Document lays down the qualitative as well as quantitative aspects of the Navy's requirement for manpower and covers the Human Resource Management continuum from induction to post retirement welfare.

Manpower Recruitment

The Navy is an extremely attractive career option. Besides being an honourable profession, it offers high potential for personal and professional growth. It offers a life replete with challenges and a host of opportunities for broadening one's horizons through extensive travel. Of late, a particularly strong thrust has been given to the enhancement of awareness amongst the youth, with regard to the Navy as a career option, and this is bearing excellent results. Obviously, the best people are required, as manning and operating state-of-the-art ships, submarines and aircraft is a challenging job. The Navy is aware that it faces competition from a number of other career-options that are available, and no effort is spared to ensure that it gets top quality and motivated young men and women to meet its organisational requirements.

Keeping pace with the changing requirements of warfare, the Navy, in 2013, introduced the SSC (IT) entry scheme to benefit from the enormous potential of the IT qualified youth. The Navy has also

introduced a SSC (Sports) entry to tap the sports talent of the country. Such entries are aimed at boosting the potential of youth of our country as the Navy provides adequate opportunities in IT, sports and adventure.

Recruitment of Sailors. Recruitment of sailors in the Navy is carried out on an all India basis on state wise merit of eligible recruitable population, which is drawn-up taking into consideration a written examination, a physical fitness test and a medical examination. The recruitment of artificer apprentices is also on all India merit basis. The recruitment schedule is designed to cater for enough preparation time for candidates. The written examination is conducted for eligible candidates and results are announced on the same day. Recruitment publicity for the Navy is carried out through advertisements in all leading national and regional newspapers, as also Employment News. Publicity material is also dispatched to a large number of schools, colleges, and Zila Sainik Boards. The types of recruitment entries for sailors are as follows:-

- (a) **Artificer Apprentices (AAs).** 10+2 Science with physics, mathematics and one subject from amongst chemistry/ biology/ computer science with 60 % and above marks in aggregate.
- (b) **Senior Secondary Examination Recruits.** 10+2 Science with Physics, Mathematics and one subject amongst chemistry/ biology/ computer science.
- (c) **Matric Entry Recruits.** Qualification through this scheme limits one's employment within the Navy to certain trades within the logistics cadre (namely cooks, stewards and musicians).
- (d) **Non-Matric Recruits.** Candidates need to have passed Class VI to be eligible for this recruitment. Qualification through this scheme limits one's employment within the Navy to employment as a Topass, within the logistics cadre.
- (e) **Direct Entry.** This recruitment is specifically for outstanding sportsmen who have excelled in any discipline.

Ex- Servicemen Affairs

Transition to Merchant Navy as Second Career. The Directorate of Ex-servicemen Affairs (DESA) is responsible to liaise with DGR to

provide effective routes for transition of ex-servicemen to the merchant Navy. DESA is in the process of resolving the issue of smooth transition of *IN* officers wherein certification at appropriate level with minimum time frame is being sought. Towards this end, representatives of DESA have been interacting with DG Shipping and other stake holders of the shipping Industry. The module being finalised with DG Shipping seeks recognition for *IN* training and bridge watch keeping experience of Naval officers by making them eligible for appropriate certification. To this effect, DESA has successfully been able to achieve the following:-

- (a) Employment of Naval officers in DG Shipping approved institutes as full time/ visiting faculty for navigation subjects.
- (b) Appointment of Naval officers on the staff of DG Shipping to streamline efforts and furthering the interests of *IN*.

With the aim to better serve retired naval officers, an umbrella organisation of the Navy Foundation was formed on 27 December 1988. Since its inception, a few organisations of retired officers running independently have passed resolutions and incorporated themselves as part of the Navy Foundation. The Navy Foundation had six chapters during inception. Today it has 15 chapters viz. Delhi, Goa, Chandigarh, Jaipur, Hyderabad, Lucknow, Mumbai, Coimbatore, Bangalore, Pune, Kolkata, Odisha (Bhubaneswar), Vizag, Chennai and Kerala (Kochi).

In an effort to reach out to the veteran sailors of the Navy, a Veteran Sailors' Forum was established on 10 April 2008 and is registered as a charitable society under the Societies Registration Act, 1860. Presently, it has four Command Chapters (New Delhi, Mumbai, Vizag and Kochi), and 12 Regional Chapters. Chief of Naval Staff is the Patron-in-Chief, Controller of Personnel Services is the President, and Principal Director Ex-Servicemen Affairs is the Vice President of the forum. The primary aim of VSF is to reach out to the veterans and provide them with necessary support as also to take up their grievances with the relevant agencies. Dissemination of information pertaining to welfare activities, pension, etc is also undertaken by VSF. Extended usage of Information Technology, such as VSF website, emails, DESA blog and e-newsletter is being made to maintain connectivity with the veterans as also to disseminate information. DESA also operates a 24x7 toll free helpline with voice interactive response system, in order to facilitate veterans to get in touch with VSF/ DESA directly from any part of the country.

In keeping with the traditional camaraderie and brotherhood that is prevalent in the Armed Forces a Naval Regimental System (NRS) was established in 2011 to institutionalize the support system and provide proactive support to widows of deceased sailors. The NRS comprises Command Regimental System Officer at Command level to reach out to widows in distant geographical locations.

Naval Training

The Indian Naval Academy (INA) is located at Ezhimala, approximately 280 km North of Kochi, in Kerala. It was inaugurated by the Prime Minister of India on 08 January 2009. Spread over 2,452 acres of coastal upland, INA has world class facilities in terms of infrastructure, for both academic pursuits and outdoor activities, including state-of-the-art laboratories, workshops, swimming pool and play fields. The academy has modern residential facilities, an excellent mess and five well laid-out squadrons, each with its own comprehensive facilities. The administrative support to INA is provided by the base depot ship, *INS Zamorin*, which was commissioned in April 2005. Built at a cost of over 721.88 crore, the academy presently accommodates and trains approximately 1400 cadets, against an existing capacity of 750 cadets. The capacity of INA is being enhanced in Phase II which is likely to be completed by 2018-19.

The first B Tech course at INA commenced in June 2009. This was a significant step in evolution of the Indian Navy to meet the technical challenges of the 21st Century. B Tech curriculum has been drawn up by the Navy, in conjunction with Jawaharlal Nehru University (JNU) and the All India Council for Technical Education (AICTE). The academic curriculum is accredited by AICTE. In addition to technical training, the Academy provides its cadets with a healthy mix of humanities and naval history. This is in keeping with the Navy's goal of providing officers with high-end technical expertise without sacrificing the proven advantage of liberal education. The curriculum not only provides adequate academic grounding for award of a B Tech degree but also caters to the overall transition of an officer cadet to a fine service officer who is always ready to defend the country.

B Tech training is conducted in Electronics and Communication Engineering for 'Executive' and 'Electrical' discipline officers and Mechanical Engineering for 'Engineering' and 'Naval Architecture' discipline officers. In order to enhance the technical knowledge of ex-

National Defence Academy (NDA) Naval cadets and to facilitate their integration with INA Cadets, NDA cadets after passing out from NDA undergo two year Masters in Science (M Sc) in applied electronics and communication curriculum. Cadets after passing out of NDA now join INA to undergo the first year of M Sc in Electronics and Communication curriculum. Thereafter, the second year of M Sc curriculum is conducted in the subsequent phases of afloat training for a period of one year thus bringing them nearly at par with cadets passing out of INA. The first B Tech course graduated from INA in May 2013. This event was a milestone for the academy and has ushered in an era of total technicalisation in the Navy.

The Indian Navy has been providing training to foreign personnel for more than 32 years, during which it has trained more than 11,000 foreign personnel from 40 countries. Our reputation for providing high quality of training drives us to constantly evaluate and evolve. It is our earnest desire to share and deliver the finest training in order to build capacity and everlasting relationship with friendly foreign countries. Realising this necessity, the Ministry of External Affairs provides assistance for training of naval personnel from a large number of countries under the Indian Technical and Economic Cooperation (ITEC) Scheme I and II. Under this scheme, the airfare, tuition fees, boarding and lodging are fully funded by the GoI (except in the case of ITEC II Scheme wherein the parent country bears the airfare cost). Further, financial aid in the form of subsistence allowance is also provided to meet living expenses for the entire duration of the course. In cases where ITEC funding is unavailable, training is availed under the Self Financing Scheme, wherein all costs are borne by the trainees' own Government.

Naval Education

The Indian Navy considers education as the foundation on which its professionalism is built upon. There are 31 Naval sector Kendriya Vidyalayas which function under the chairmanship of naval authorities. In addition, the Naval Education Society, registered under the Registrar of Societies, Delhi on 13 April 1987, lays down general policy and guidelines for functioning of Navy Children Schools (NCS)/ Naval Kinder Garten (NKG) in the Indian Navy. The Indian Navy has setup 54 Naval Reference Libraries to provide resource for professional and recreational reading thereby providing naval personnel a means by which they can build upon their professional knowledge and improve all round

awareness. The Navy also liaises with School of Foreign Language (SFL), New Delhi under Ministry of Defence for conduct of foreign language courses for naval personnel. In addition, sailors are being deputed to Army Education Corps, Training College & Centre, Panchmarhi for undergoing Sinhala interpretership course of 16 months duration with effect from 16 April 2012.

Information and Communication Technology (ICT) has created favourable conditions to enhance accessibility to digital content irrespective of time and geographical location. The creation of digital libraries in the Navy is an organised effort to technologically enable and organise digital repositories of knowledge Navy wide with single window access to e-books, e-journals and other relevant e-documents for archival, present and future use. The two models planned to be implemented for facilitating digital content are creation of Institutional Repositories (IRs) through internal network of the Navy based digital library network and access to internet based online resources. The project will be implemented in two phases. Phase I consists of creating digital libraries at seven locations. In Phase II seven more libraries would be covered and the balance libraries would be covered in Phase III.

A Memorandum of Understanding was signed with IGNOU on 23 September 2000 for setting up of regional centres/ study centres in the Navy for facilitating various courses of IGNOU for naval personnel in naval premises. At present, nine courses are being offered through this scheme. There are four regional centres functioning; one each at New Delhi, Mumbai, Visakhapatnam and Kochi. In addition 16 INEP liaison cells have been set up. INEP provides a single window to facilitate smooth processing of applications, resource material, information brochure, study material etc. at remotely based naval stations.

The Navy tied up with following Universities/ Institutes/ Colleges for assured admission to wards of naval personnel towards provision of higher education for professional courses:-

- (i) Sharda University, Greater Noida.
- (ii) Lovely Professional University, Phagwara.
- (iii) OP Jindal Global University, Sonipat.
- (iv) Apeejay Satya University, Gurgaon.

- (v) PDM Group of Institutions, Bahadurgarh (Haryana).
- (vi) CT Group of Institutions, Jalandhar.
- (vii) Shivalik College of Engineering, Dehradun.
- (viii) SRM University, Chennai.
- (ix) DR MGR University, Chennai.
- (x) Centurian University of Technology and Management, Bhubaneswar.

Implementation Of Official Language Policy. Being a constitutional obligation, official language policy of the Gol in the Indian Navy is implemented effectively. Various Gol orders and schemes for propagation of Hindi as the official language of the Union are followed to ensure its implementation. Meetings of the Official Language Implementation Committee were held regularly headed by senior officers in the Navy. Events like Hindi pakhwara, Hindi workshops and classes under Hindi teaching scheme were held to promote use of Hindi in official work. Incentives and awards were given to the personnel who carried out their work in Hindi. Translation of various documents such as NOs, NIs, notes, citations, press release, annual report, audit paras, scientific and technical manuals, messages from senior officers etc was also done regularly as part of implementation of official language policy of the Gol.

Sports and Adventure Activities

The Indian Navy's sportsmen have consistently done their country proud in the International arena. 40 Naval sportsmen represented the country at various international sports events during the year 2013-14 and won six Gold, two Silver and four Bronze medals. As many as 207 naval sportsmen participated at various National level sporting events in the year 2013-14 and won a total of 48 medals, which included 17 Gold, 11 Silver and 20 Bronze medals. In the year 2014-15 till date, a total of 14 naval sportsmen have participated at the National level and won three Gold and eight Silver medals.

Indian Naval Sailing Vessel *Mhadei* was procured in February 2009. The boat, since its induction, has been intensively deployed across the globe for ocean sailing activities including the first ever historic solo circumnavigation undertaken by Cdr Dilip Donde. Sagar Parikrama I, wherein the vessel circumnavigated the globe while touching only four ports of Fremantle (Australia), Lyttelton (New Zealand), Port Stanley (Falklands) and Cape Town (South Africa). On 19 May 2010, Cdr Dilip Donde created history when he successfully completed the voyage and become the first Indian and 175th person in the world to do so. During the voyage, INSV *Mhadei* sailed for a total of 157 days. For this astounding feat, Cdr Dilip Donde was awarded the coveted Shaurya Chakra. Similarly, Sagar Parikrama II was undertaken by Lt Cdr Abhilash Tomy, wherein the vessel traversed approximately 22,600 nm in 150 days crossing all the three Capes ie. Cape Horn, Cape Leeuwin and Cape of Good Hope. The voyage concluded on 31 March 2013 at Mumbai and the Indian Navy once again stamped its authority on the Maritime world and displayed the professional acumen of our young mariners. For the expedition Lt Cdr Abhilash Tomy won recognition from across the world and has been a source of motivation to a generation of young Indians. He was awarded the Kirti Chakra for being the first Indian to undertake a non-stop circumnavigation of the globe. A proposal for an all women crew of *Mhadei* is under consideration at IHQ MoD (Navy). The crew would be trained in art of oceanic sailing onboard *Mhadei* and would sail for Sagar Parikrama III.

Medical Services

The Indian Navy has utmost concern for maintenance of health of its personnel and their dependents. Towards ensuring this, many ambitious upgradation projects have been taken up to enhance the scale and facilities of naval hospitals. Approval in Principle has been obtained for upgradation of Indian Naval Hospital *Kalyani* at Visakhapatnam to a 604 bedded command hospital. Similarly, Approval in Principle of VCNS was accorded in July 2013 for upgradation of INHS *Sanjivani*, the naval hospital at Kochi, from a 333 bed to a 699 bed command hospital. INHS *Navjivani*, the ninth naval hospital, was commissioned on 12 December 2012, thereby providing the Indian Naval Academy at Ezhimala with its deserved medical care facility in close proximity.

The Naval Healthcare Information Management System (NHIMS), enterprise software application, has been implemented at INHS *Asvini* and INHS *Kalyani*. In the next roll-on phase, to be implemented soon,

NHIMS would provide computerised network of patient care at five more Naval Hospitals.

Telemedicine. The Indian Navy is an emerging blue water maritime force capable of operating far beyond the shores of the hinterland for prolonged durations. Under such circumstances, occurrence of injuries or sickness onboard has to be addressed comprehensively on site. Further, the Navy is also responsible for anti-piracy operations and manning and protection of remote island locations. It is not possible to provide specialist and super specialist medical care to naval personnel at sea or in remote locations routinely. The telemedicine project is a unique fusion of technologies comprising diverse vertical specialties of medicine, IT and space communication. Disembarking Naval personnel for medical reasons in foreign ports may not always be feasible due to geopolitical constraints. In order to address this issue in a comprehensive manner, the Indian Navy is progressing a case for implementation of a telemedicine project which would link operational platforms and units in remote locations with naval hospitals. These ships and units are planned to be equipped with facility to transmit the patient's vital parameters and clinical condition digitally and by video. The hospitals would be able to access the parameters and data of the patient and provide specialist/ super specialist advice to the telemedicine-enabled units for managing the case.